In the Matter of

CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE

Investigation No. 337-TA-721

Publication 4367
February 2013

U.S. International Trade Commission

Washington, DC 20436
In the Matter of

CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE

Investigation No. 337-TA-721
UNITED STATES INTERNATIONAL TRADE COMMISSION
Washington, D.C.

In the Matter of
CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE

Investigation No. 337-TA-721

NOTICE OF COMMISSION FINAL
DETERMINATION FINDING NO VIOLATION OF SECTION 337;
TERMINATION OF THE INVESTIGATION


ACTION: Notice.

SUMMARY: Notice is hereby given that the U.S. International Trade Commission has found no violation of section 337 of the Tariff Act of 1930, 19 U.S.C. § 1337 with respect to United States Patent No. 6,999,800 ("the '800 patent") in this investigation, and has terminated the investigation.

FOR FURTHER INFORMATION CONTACT: Amanda S. Pitcher, Esq., Office of the General Counsel, U.S. International Trade Commission, 500 E Street, S.W., Washington, D.C. 20436, telephone (202) 205-2737. 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, S.W., Washington, D.C. 20436, telephone 202-205-2000. General information concerning the Commission may also be obtained by accessing its Internet server (http://www.usitc.gov). The public record for this investigation may be viewed on the Commission's electronic docket (EDIS) at http://edis.usitc.gov. Hearing-impaired persons are advised that information on this matter can be obtained by contacting the Commission's TDD terminal on 202-205-1810.

On October 17, 2011, the ALJ issued his final ID, finding no violation of section 337 by the Respondent. Specifically, the ALJ found that the Commission has subject matter jurisdiction and that Apple did not contest that the Commission has in rem and in personam jurisdiction. The ALJ also found that there was an importation into the United States, sale for importation, or sale within the United States after importation of the accused portable electronic devices and related software. Regarding infringement, the ALJ found that Apple does not infringe claims 1, 2, 4, 6, 10, 11, 14, and 15 of the '800 patent, claims 1 and 10 of the '988 patent, claims 8-9 of the '957 patent and claims 1-2 of the '505 patent. With respect to invalidity, the ALJ found that the asserted claims are not invalid. Finally, the ALJ concluded that an industry exists within the United States that practices the '988 and '957 patents, but not the '800 and '505 patents as required by 19 U.S.C. § 1337(a)(2).

On October 31, 2011, HTC filed a petition for review of the ID, which also included a contingent petition for review. Also on October 31, 2011, Apple filed a contingent petition for review. On November 8, 2011, the parties filed responses to the petition and contingent petitions for review. On December 16, 2011, the Commission determined to review the ID in part. The Commission determined to review the ALJ’s findings for '800 patent in its entirety and requested briefing on nine issues, and on remedy, the public interest and bonding. 76 Fed. Reg. 79708-09 (Dec. 22, 2011). The Commission did not review any issues related to the '505 patent and reviewed in part the ALJ’s findings for the '988 and '957 patents. Id. The Commission took no position on one limitation and affirmed the remainder of the ALJ’s findings for the '988 and '957 patents. Id. The Commission terminated those patents from the investigation. Id.

On January 4, 2012, the parties filed written submissions on the issues under review, remedy, the public interest, and bonding. On January 11, 2012, the parties filed reply submissions on the issues on review, remedy, the public interest, and bonding.

Having examined the record of this investigation, including the ALJ’s final ID, the Commission has determined that there is no violation of section 337. Specifically, the Commission has determined to reverse the ALJ’s finding that the “switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time” limitation of claim 1 is met and affirm the ALJ’s determination that the accused products do not meet the “implementing a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off mode when the detected amount is less than a second threshold” limitations of claim 1. In addition, the Commission affirms the ALJ’s finding that no domestic industry exists for the '800 patent. The Commission also finds that Apple’s waiver argument is moot.

By order of the Commission.

James R. Holbein  
Secretary to the Commission

Issued: February 17, 2012
CERTIFICATE OF SERVICE

I, James R. Holbein, hereby certify that the attached NOTICE has been served by hand upon the Commission Investigative Attorney, Jeffrey T. Hsu, Esq., and the following parties as indicated, on February 17, 2012.

James R. Holbein, Secretary
U.S. International Trade Commission
500 E Street, SW
Washington, DC 20436

On Behalf of Complainant HTC Corp.:

Thomas L. Jarvis, Esq.
FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER, LLP
901 New York Avenue, NW
Washington, DC 20001

On Behalf of Respondent Apple Inc.:

V. James Adduci, II, Esq.
ADDUCI, MASTRIANI & SCHAUMBERG, L.L.P.
1133 Connecticut Avenue, NW 12th Floor
Washington, DC 20036
In the Matter of

CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE

Investigation No. 337-TA-721

COMMISSION OPINION

This investigation is before the Commission for a final determination with respect to U.S. Patent No. 6,999,800 ("the '800 patent"). The Commission has decided to affirm the presiding administrative law judge's ("ALJ") determination that there is no violation of section 337 of the Tariff Act of 1930, as amended, 19 U.S.C. § 1337, in connection with claims 1-2, 4, 6, 10, 11, 14 and 15 of the '800 patent. Specifically, the Commission reverses the ALJ's finding that the "switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time" limitation of claim 1 of the '800 patent is not met by the Accused iPhones but affirms the ALJ's determination that the "implementing a power detection" steps are not met by the Accused iPhones. The Commission also affirms the ALJ's determination of no domestic industry.

1 The Commission adopted the ALJ's findings that the respondent did not violate section 337 of the Tariff Act of 1930, as amended, 19 U.S.C. § 1337, in connection with the asserted claims of United States Patent Nos. 5,541,988 ("the '988 patent"); 6,320,957 ("the '957 patent"); and 7,716,505 ("the '505 patent") in its Notice issued on December 16, 2011 to review the final ID in part. 76 Fed. Reg. 79,708-09 (Dec. 22, 2011). The Commission determined not to take a position on one limitation for the '957 and '988 patents. Id.

2 HTC accused the original iPhone, iPhone 3G, iPhone 3GS, iPhone 4, and CDMA iPhone of infringing the asserted claims of the '800 patent.
The Commission adopts the ALJ’s findings to the extent they are consistent with the findings herein.

I. BACKGROUND

A. Procedural History

The Commission instituted this investigation on June 17, 2010, based on a complaint filed by HTC Corporation (“HTC”) of Taoyuan City, Taiwan. 75 Fed. Reg. 34,484-85 (June 17, 2010). The complaint alleged violations of section 337 in the importation into the United States, the sale for importation, and sale within the United States after importation of certain portable electronic devices and related software by reason of infringement of claims 1-2, 4, 6, 10, 11, 14 and 15 of the ’800 patent; claims 1 and 10 of the ’988 patent; claims 20-21 and 30 of United States Patent No. 6,058,183 (“the ’183 patent”); claims 1, 2, 8, 9, 39 and 42-44 of the ’957 patent; and claims 1-3 of the ’505 patent. The complaint named Apple, Inc. (a/k/a Apple Computer, Inc.) (“Apple”) of Cupertino, California as the proposed respondent. The ALJ held a Markman hearing on October 25-26, 2010 and issued Order No. 29, construing the terms of the asserted claims of the patents in the investigation. See Order No. 29 (“Markman Order”).

During the investigation, the ALJ granted HTC’s motion to partially terminate the investigation as to claim 3 of the ’505 patent, claims 1, 2, 39 and 42-44 of the ’957 patent, and all asserted claims of the ’183 patent. Order Nos. 10, 37. The Commission determined not to review the IDs. See Notice of Comm’n Determination Not to Review an Initial Determination Granting Complainant’s Unopposed Motion to Terminate the Investigation as to Claim 3 of U.S. Patent No. 7,716,505; Claims 1 and 2 of U.S. Patent No. 6,320,957, and All Asserted Claims of U.S. Patent No. 6,058,183 (Nov. 29, 2010); Notice of Comm’n
Determination Not to Review an Initial Determination Granting Complainant’s Unopposed Motion to Terminate the Investigation as to Claims 39 and 42-44 of U.S. Patent No. 6,320,957 (Mar. 17, 2011). On March 15, 2011, the ALJ issued an ID granting HTC’s motion for summary determination that it satisfies the economic prong of the domestic industry requirement. See Order No. 40. The Commission decided not to review this determination. See Notice of Comm’n Determination Not to Review an Initial Determination Granting Complainant’s Motion For Summary Determination that it has Met the Economic Prong of the Domestic Industry (Apr. 5, 2011).

The ALJ held an evidentiary hearing from May 9, 2011 to May 16, 2011, and thereafter received post-hearing briefing from the parties. On October 17, 2011, the ALJ issued his final ID, finding no violation of section 337 by Apple’s Accused Products. Specifically, the ALJ found that the Commission has subject matter jurisdiction and that Apple did not contest that the Commission has in rem and in personam jurisdiction. ID at 5-6. The ALJ also found that there has been an importation into the United States, sale for importation, or sale within the United States after importation of the accused portable electronic devices and related software. Id. at 5. Regarding infringement, the ALJ found no infringement of claims 1 and 10 of the ’988 patent; claims 8 and 9 of the ’957 patent; claims 1, 2, 4, 6, 10, 11, 14, and 15 of the ’800 patent; and claims 1 and 2 of the ’505 patent. Id. at 0. The ALJ found that none of the patents were invalid. Finally, the ALJ concluded that an industry exists within the United States that practices the ’988 patent and the ’957 patent, but not the ’800 patent or the ’505 patent. Id. As a result, the ALJ concluded that there was no violation of section 337. Id. at 106.

3 The accused products in this investigation are Apple products that include various models of the iPhone, iPod Touch, and iPad (collectively “Accused Products”).
The ID included the ALJ’s recommended determination ("RD") on remedy and bonding. The ALJ recommended that in the event the Commission finds a violation of section 337, the Commission should issue a limited exclusion order prohibiting the importation of Apple’s infringing portable electronic devices and related software. Id. at 108-09. The ALJ also recommended issuing a cease and desist order in addition to the limited exclusion order because there is already a “commercially significant” amount of the Accused Products within the United States that could be sold. Id. at 109-10.

On October 31, 2011, HTC filed a petition for review of the ID. See Complainant HTC Corp.’s Petition for Review of the Final Initial Determination ("HTC Pet."). With respect to the '800 patent, HTC challenged the ALJ’s infringement findings and claim constructions or application thereof related to the “switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time” limitation and the “implementing a power detection method” steps of independent claim 1, and the ALJ’s finding that the technical prong of domestic industry was not met for the “implementing a power detection method” steps of independent claim 1. HTC Pet. at 12-30.

Also, on October 31, 2011, Apple filed a contingent petition for review. See Respondent Apple Inc.’s Contingent Petition for Review of Initial Determination ("Apple Pet."). Relevant to the Commission’s review, Apple argued that the Accused iPhones and HTC’s domestic industry products ("HTC DI Products") do not meet the requirement of “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” of the '800 patent or alternatively that the claims are invalid. Id. at 12-17. Apple also argued, for the '800 patent, that the HTC DI

---

4 Under the Commission’s Rules, contingent petitions for review are treated as petitions for review. 19 C.F.R. § 210.42(b)(3).
Products do not compare the same "detected amount" to the first and second thresholds of claim 1. *Id.* at 17-18. Further, Apple argued that HTC failed to prove that Apple directly infringed the '800 patent. *Id.* at 18-20.


On December 16, 2011, the Commission determined to review the final ID with respect to the '800 patent and requested briefing on several issues and on remedy, the public interest and bonding. 76 Fed. Reg. 79,708-09 (Dec. 22, 2011). In its notice of partial review, the Commission asked the parties the following questions:

1. In the Accused iPhones, is the applications processor power management unit (AP PMU) a part of the personal digital assistant (PDA), the mobile phone system, or both?

2. In the Accused iPhones, when the [[ ]] does the PDA, the mobile phone system, or both, switch between modes? In the Accused iPhones, when the [[ ]] does the PDA, the mobile phone system, or both, switch between modes?
3. Do the claims, specification, or prosecution history require that only one of the systems (i.e., either the mobile phone system or PDA) power off when each of the thresholds is met?

4. Are there separate thresholds in HTC’s domestic industry products that result in the mobile phone system turning off separately from the PDA? If the mobile phone and PDA systems turn off simultaneously, is there record evidence proving that the thresholds are separately set to the same limits?

5. Is claim 1 of the ’800 patent anticipated by the Qualcomm pdQ device? Please explain where each element is present in the pdQ device.

6. Do the Accused iPhones meet the “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitation of claim 1 of the ’800 patent?

7. Do the HTC domestic industry products meet the “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitation of claim 1 of the ’800 patent?

8. Do the Accused iPhones meet the “switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time” limitation of claim 1 of the ’800 patent?

9. Although the Commission has determined to review the ’800 patent in its entirety, can the parties respond to Apple’s argument that, because HTC did not petition for review of the limitations of claim 1 of the ’800 patent on which the ALJ made no findings concerning infringement, “HTC has therefore waived any argument on review that these claim limitations are present in the accused iPhones?” Respondent Apple Inc.’s Response to HTC’s Petition for Review of Initial Determination at 3. In your response, please reference any relevant Section 337 or Federal Circuit precedent.
On January 4, 2012, the parties filed submissions on the issues under review, remedy, the public interest, and bonding. On January 11, 2012, the parties filed reply submissions.5

B. **Patents and Technology at Issue**

The technology at issue for the '800 patent is directed to wireless telephones. Specifically, the '800 patent relates to power management of smartphones. The '800 patent is entitled “Method for Power Management of a Smart Phone” and was filed on July 1, 2003. JX-1, '800 patent. The '800 patent issued on February 14, 2006 to named inventors Yu-Chung Peng, Ching-Hsiang Chang, Tzu-Hsun Tung and Hsi-Cheng Yeh. *Id.* The '800 patent describes a method of power management for a smartphone in which the mobile phone system is switched from standby mode “to sleep mode when the mobile phone system has been idle for a first time period.” *Id.* at 1:51-53. In addition, the '800 patent describes “switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time.” *Id.* at 1:53-55. The Abstract notes that the power detection switches “the mobile phone and PDA system to off mode when the power is lower than a first and second threshold respectively.” *Id.* at Abstract. HTC has asserted independent claim 1 and dependent claims 2, 4, 6, 10, 11, 14 and 15 in this investigation. *Id* at 106; HTC RBr. at 1.

C. **Products At Issue**

The Accused Products in this investigation are Apple models of the iPhone, iPod Touch, and iPad. *Id* at 4. Specifically, with respect to the '800 patent, HTC asserts that the

---

5 The parties’ responses to the Commission’s questions are cited as “HTC Br.,” “Apple Br.” and “OUII Br.”; and the parties’ replies to the initial responses to the Commission’s questions are cited as “HTC RBr.,” “Apple RBr.” and “OUII RBr.”
original iPhone, iPhone 3G, iPhone 3GS, iPhone 4, and CDMA iPhone (collectively
"Accused iPhones") infringe the asserted claims of that patent. *Id.* at 4.

Relevant to this opinion, independent claim 1 teaches that the PDA system can be
operated in normal, sleep, or off modes. ’800 patent at 6:32-34. HTC alleges that the
][ of the Accused iPhones is the claimed “normal mode,” the ][
] of the PDA system is the claimed “sleep” mode, and that the ][ is the
claimed “off mode.” HTC Pet. at 6-7; *see also* CX-1405.2C at 170-171. The Accused
iPhones’[

][ See *e.g.*, JX-39C; HTC Pet. at 6-7.

II. VIOLATION AND THE ’800 PATENT UNDER REVIEW

As discussed above, the Commission determined to review the ID’s findings with
respect to ’800 patent in its entirety. Asserted independent claim 1 recites (the elements have
been labeled for discussion purposes):

1. A method for power management of a smart phone having a
power system, a mobile phone system operated in standby,
sleep, connection or off mode, and a PDA system operated in a
normal, sleep or off mode, the method comprising the steps of:

resetting the smart phone; [element la]

searching for network service for the mobile phone system;
[element 1b]

operating the mobile phone system in standby mode and the
PDA system in normal mode when the network is located and
connected to; [element lc]

switching the mobile phone system from standby mode to
connection mode when establishing communication with a
remote terminal of the network; [element ld]
switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time; [element le]

switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time; and [element 1f]

implementing a power detection method comprising steps of:
[element lg]

detecting an amount of power of a source in the power system; [element lg1]

switching the mobile phone system to off mode when the detected amount is less than a first threshold; and [element lg2]

switching the PDA system to off mode when the detected amount is less than a second threshold. [element lg3].

JX-1, '800 patent at 6:30-59.

The ALJ’s final ID only addressed whether complainant had established that the Accused Devices met the limitations in element 1f and the power detection elements of lg (lg1 to lg3) of claim 1 above; having found that these elements were not shown, the ID did not address the other elements of claim 1. Our discussion below addresses these elements of claim 1; the Commission finds that, while element 1f is met, the power detection elements of lg are not, and thus the Commission affirms the ALJ’s conclusion that complainant has not established infringement of claim 1 of the '800 patent. The Commission declines to take a position on the remaining elements of claim 1.
A. Whether Element 1f of Claim 1 of the '800 Patent is Met By the Accused iPhones

Our determination of whether or not element 1f is met rests on the determination of what constitutes a “sleep mode” and what constitutes an “off mode.” The ALJ construed “sleep mode” in element 1f to mean “an operational mode in which the amount of power supplied to the subsystem is less than any mode except for off mode” and “off mode” to mean “an operational mode in which the least amount of power is supplied to the subsystem compared to any other operational mode (e.g., normal, sleep, connection, or standby).” Id. at 22, 26. HTC did not challenge the ALJ’s claim constructions of “sleep mode” or “off mode” but rather the application of these terms. In finding that the Accused iPhones do not meet this limitation, the ALJ found that [[

]] ID at 58-59. Thus the ALJ found that [[

]] as advocated by HTC, is the mode in which “the amount of power supplied to the subsystem is less than any mode except for off mode.”

In contrast to the ALJ’s finding, the parties agree, and the Commission finds, that the evidence shows that the [[

]] See e.g., HTC Br. at 7-8; Apple Br. at 5-11; Alpert Tr. at 1453:10-1454:3, 1455:7-1456:24; Williams Tr. at 440:21-441:5; RX-806C at Q. 55; RX-807.1C at Q. 280; CX-1405.2C at Q. 157. For

6 The Commission notes that the parties dispute whether or not the AP PMU is part of the PDA system. Compare HTC Br. at 4, 7 with Apple Br. at 3-4. The Commission finds that this issue is not dispositive of the amount of power “supplied to” the PDA.
example, Dr. Alpert, Apple’s expert, who qualified his testimony for when the AP PMU is not part of the PDA system, testified as follows:

\[ [\text{Alpert, Tr. at 1456:11-21; see also RX-807.1C at Q. 280. Dr. Williams, HTC’s expert, testified as follows:}][\text{CX-1405.2C at Q. 157; see also Williams, Tr. 415:1-430:5, 429:5-430:5, 434:22-435:2.}]

Therefore, the evidence supports a finding that the \[ [\text{Because the [[}][\text{are the operational modes in which the least amount of power is supplied to the PDA system, [[}][\text{meet the ALJ’s construction of “off mode.” The [[}][\text{is the next lowest power mode that is supplied power and therefore satisfies the ALJ’s construction for “sleep mode,” which is “an]]}]]

- 11 -
operational mode in which the amount of power supplied to the subsystem is less than any mode except for off mode.” Markman Order at 26 (emphasis added); see e.g., Alpert, Tr. 1450:12-16; 1453:10-1454:3, 1455:7-1456:24; Williams, Tr. 415:430:5, 429:5-430:5, 434:22-435:2, 440:21-441:5; CX-1405.2C at Q. 157, 254, 536, 539, 548-49, 959, 962, 971-72, 1383, 1386, 1395-96, 1811, 1814, 1823-24, 2250, 2253, 2262; RX-807.1C at Q. 233, 280; RX-806C at Q. 55, 76, 99; Conner, Tr. 1318:16-1319:21; see also HTC Br. at 7-8; Apple Br. at 5-11. Thus, a preponderance of the evidence supports the finding that the [ ] of the Accused iPhones meets the “sleep mode” limitation of element 1f. Accordingly, the Commission reverses the ALJ’s finding that the Accused iPhones do not meet this element.

B. Whether the “Implementing a Power Detection Method Comprising Steps of” (Element 1g) “Detecting an Amount of Power of a Source in a Power System” (Element 1g1); “Switching the Mobile Phone System to Off Mode When the Detected Amount is Less Than a First Threshold” (Element 1g2); and “Switching the PDA System to Off Mode When the Detected Amount is Less Than a Second Threshold” (Element 1g3) Limitations Are Met by the Accused iPhones and Practiced by the HTC DI Products

1. Infringement

The ALJ correctly found that HTC has not proven by a preponderance of the evidence that the Accused iPhones meet the steps of the “implementing a power detection method” limitation (element 1g). The Commission finds that the Accused iPhones have [ ] and therefore, the Accused iPhones do not meet this limitation. In addition, the Commission finds that the [ ] and therefore, the Accused iPhones do not have
separately set thresholds. Accordingly, the Commission affirms the ALJ’s determination of no infringement for these claim elements.

The ALJ found that: “[t]he claim construction requires that the MPS be switched to off mode when ‘the detected amount of power in the power source is less than a first value’ and the PDA system be switched to off mode when ‘the detected amount of power in the power source is less than a second value,’ provided that ‘the values of the first and second thresholds may be the same or different, and must be separately set.’” ID at 61. The ALJ also determined that “while the first and second thresholds can be the same or different, the ‘detected amount’ that is compared to the first threshold is the same as the ‘detected amount’ that is compared to the second threshold.” *Id.* The ALJ concluded that the “detected amount” limitation is not met in the Accused iPhones because [ ]

*Id.* The Commission agrees with his claim construction and this analysis of the Accused iPhones.

The claims recite four elements that relate to the detection of power (*i.e.*, 1g, 1g1, 1g2, and 1g3). The “power detection method” of “detecting an amount of power of a source” provides the antecedent basis for “the detected amount” recited in claim elements 1g2 and 1g3 and indicates that one detected amount is compared to both the first and second thresholds. Further, Figure 10 of the specification illustrates a detection and comparison method of the invention that shows that during any iteration of the method of Figure 10, the amount detected in step 101 is compared to both thresholds. JX-1, '800 patent at Fig. 10.

---

7 The parties and the ALJ often refer to the mobile phone system as the “MPS.”
8 HTC did not challenge the ALJ’s construction but instead argues that the ID did not apply the “separately set” limitation consistent with the construction. HTC Pet. at 23.
Thus, the plain language of the claim and the specification support the ALJ's finding that one detected amount of power is compared to the first and second thresholds.

In determining whether or not there was more than one power detection amount compared to the thresholds in the Accused iPhones, the ALJ relied upon testimony from Apple’s expert witness, Dr. Alpert, who testified as follows:

[[

]]
RX-807.1C at Q. 250, 275. 9 Dr. Williams testified that the PDA system and mobile phone systems [[

]] See e.g., CX-1405.2C Q. 567-93, 990-1016, 1413-46, 1842-76, 2280-2313. This evidence supports the ALJ’s conclusion that the [[

]]

Accordingly, the Commission finds that the ALJ properly determined that the Accused iPhones do not compare one detected amount to both the first and second thresholds, as required by these claim limitations.

As noted above, the Commission also finds that the ALJ properly determined that the Accused iPhones do not have “separately set” first and second thresholds because [[

]] One of the parties’ significant disagreements for the 1g limitations rests on whether or not the ’800 patent allows for the mobile phone and PDA systems to both turn off based on a single threshold. In reviewing the claims, specification, and the parties’ arguments, the Commission finds that the ALJ correctly determined that both the PDA and mobile phone systems cannot be turned off when a single threshold is met and still meet the limitations of claim 1.10 The Commission adopts his reasoning and adds the following analysis.

First, the plain reading of the claim language requires that there be a one-to-one correspondence between the specified system and the specified threshold. Specifically, the

9 The Commission notes that the evidence relied upon by the ALJ does not support the further conclusion that the Accused iPhones [[

]] ID at 61. Specifically, this evidence does not support independently switching the [[

]] Therefore, the Commission does not adopt this finding of the ALJ.

10 Claim 1 is independent and the remaining asserted claims are dependent claims.
claim language requires that the mobile phone system turn to “off mode” when the amount detected is less than a first threshold; and that the PDA turn to “off mode” when the amount detected is less than a second threshold. The ALJ’s claim construction requires that the two thresholds be separately set for the PDA and mobile phone systems. Markman Order at 27. The plain reading of the claim is consistent with the ALJ’s construction.

The Background of the Invention teaches that the advantage of the invention is the ability to use one system (e.g., PDA system) while conserving power in the other system (e.g., mobile phone system) by separately managing the power operations. JX-1, ’800 patent at 1:22-32. The Abstract is also consistent with the plain meaning of the claim. The Abstract recites “implementing power detection to switch the mobile phone and PDA systems to off mode when the detected power is lower than a first and second threshold respectively.” Id. at Abstract (emphasis added). The plain meaning of the word “respectively” is that the PDA and mobile phone systems have separate thresholds that are separately used to power off the mobile phone and PDA systems.

Contrary to HTC’s contention, the specification does not teach that the flowchart of Figure 10 results in turning off both the PDA and mobile phone system when the detected amount is less than one of the two specified thresholds. Instead, Figure 10 shows a detected amount is compared to the second threshold and if that threshold is not met, the detected amount is compared to the first threshold. There is no evidence from Figure 10 or the specification that supports HTC’s position both systems turn off as a result of either threshold being met. For these reasons, the Commission agrees with the ALJ’s determination that both systems cannot be turned off when one threshold is met.
In light of this claim construction, the ALJ found that “[t]he values of the first and second thresholds, identified by HTC as [[
] ID at 62. The ALJ determined that because [[
]]

The parties generally agree on the operation of the Accused iPhones. Both Apple and HTC agree that the thresholds for [[
] are different. Apple Rep. at 18; HTC Br. at 17. The parties also agree that when the [[
] Apple Br. at 11; HTC Br. at 20. They further agree that when the Accused iPhones’ PDA system is in [[
]]

The parties’ main disagreement is about whether the PDA is in “off mode” when it is [[
] Apple RBr. at 5; HTC Br. at 20-21. HTC argues that because the Accused iPhones [[
] HTC Br. 18-21. More specifically, HTC asserts that when [[
]]

Id. Apple and the IA, on the other hand, argue that because [[
]
Apple argues that the operation is therefore immaterial because when the

As discussed above for element 1f, the modes both satisfy the ALJ’s construction of “off mode,” in as much as they both constitute an operational mode where the least amount of power is supplied to the PDA system. Therefore, when the

The fact that the PDA system does not change the fact that when the Nothing in the claims precludes one or both of the systems from later being turned back on. Accordingly, elements 1g2 and 1g3 are not met by the Accused iPhones because the first and second thresholds are not separately set.11

2. Domestic Industry

The Commission finds that the ALJ correctly determined that the HTC DI Products do not practice claim 1 of the ‘800 patent. The Commission agrees with the ALJ that when each threshold is met, the entire device turns off and adopts his reasoning.

The ALJ determined that when the first threshold is met, both the mobile phone system and the PDA system shut down. ID at 77. The ALJ further determined that when the second threshold is met, both the mobile phone system and PDA shut

11 The Commission takes no position on whether or not the PDA system switches to “off mode” when the is met for element 1g3.
down. *Id.* The ALJ concluded that the first and second thresholds are not “separately set” because each threshold is set for the entire device and, therefore, the HTC DI products do not practice claim 1 of the ’800 patent and no domestic industry exists. *Id.* at 78.

Therefore, both the mobile phone system and the PDA system do not switch to “off mode” without also switching the other respective system to “off mode.” Accordingly, the Commission affirms the ALJ’s determination.

Apple also requested that the Commission determine whether the HTC DI Products also do not have two separately set thresholds because two different detected amounts are used to determine if the first and second thresholds are met. The Commission declines to take a position on this issue.

C. Whether the Accused iPhones and the HTC DI Products Practice Claim Element 1e, or Whether the Asserted Claims Are Invalid

On review, Apple contingently petitioned that the ID did not address element 1e and that if the ID is read to find that the “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitation is met, that this finding is “inconsistent with the finding that the prior art Qualcomm pdQ smartphone does not practice Element 1e.” *Apple Pet.* at 12. Apple argued that the finding is inconsistent because the Accused iPhones, the HTC DI Products and the Qualcomm pdQ [*Id.*] when disconnected from a network.” *Id.* The Commission declines to take a position on whether the “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitation is met by the Accused iPhones and/or the HTC
DI Products. The Commission also declines to take a position on whether the Qualcomm pdQ smartphone invalidates claim 1.

D. Whether HTC’s Petition Should Be Dismissed Based on Waiver

The Commission finds that Apple’s waiver argument is moot. In response to HTC’s petition for review, Apple argued that HTC’s petition must fail because HTC did not petition for review of the limitations not addressed by the ALJ, but only asserted that three claim limitations are at issue with respect to the Accused iPhones. Apple Rep. at 1-5. Apple argues that HTC waived its arguments as to those limitations and cannot prove that they are met. Id. HTC responds that because the Commission determined to review the ’800 patent in its entirety, “the question of whether the right to petition for review has been preserved is moot.” HTC Br. at 49. The Commission agrees with HTC. The Commission determined to review the ’800 patent in its entirety, and whether or not HTC has waived its right to petition the limitations not addressed by the ALJ is now immaterial. The Commission takes no position on these limitations.

E. Whether HTC Can Prevail In Light of the Commission’s Opinion in Inv. No. 337-TA-724


III. CONCLUSION

For the reasons set forth above, the Commission finds no violation of section 337 by Apple with respect to the ’800 patent.
By order of the Commission.

[Signature]

James R. Holbein
Secretary to the Commission

Issued: April 19, 2012
CERTIFICATE OF SERVICE

I, James R. Holbein, hereby certify that the attached OPINION has been served by hand upon the Commission Investigative Attorney, Jeffrey T. Hsu, Esq., and the following parties as indicated, on April 19, 2012.

James R. Holbein, Secretary
U.S. International Trade Commission
500 E Street, SW
Washington, DC 20436

On Behalf of Complainant HTC Corp.:

Thomas L. Jarvis, Esq.
FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER, LLP
901 New York Avenue, NW
Washington, DC 20001

( ) Via Hand Delivery
( ) Via Overnight Mail
( ) Via First Class Mail
( ) Other: __________

On Behalf of Respondent Apple Inc.:

V. James Adduci, II, Esq.
ADDUCI, MASTRIANI & SCHAUMBERG, LLP.
1133 Connecticut Avenue, NW 12th Floor
Washington, DC 20036

( ) Via Hand Delivery
( ) Via Overnight Mail
( ) Via First Class Mail
( ) Other: __________
NOTICE OF COMMISSION DETERMINATION TO REVIEW IN PART A FINAL INITIAL DETERMINATION FINDING NO VIOLATION OF SECTION 337; SCHEDULE FOR FILING WRITTEN SUBMISSIONS ON THE ISSUES UNDER REVIEW AND ON REMEDY, THE PUBLIC INTEREST AND BONDING


ACTION: Notice.

SUMMARY: Notice is hereby given that the U.S. International Trade Commission has determined to review in part the final initial determination (“ID”) issued by the presiding administrative law judge (“ALJ”) on October 17, 2011, finding no violation of section 337 of the Tariff Act of 1930, 19 U.S.C. § 1337, in this investigation.

FOR FURTHER INFORMATION CONTACT: Amanda S. Pitcher, Esq., Office of the General Counsel, U.S. International Trade Commission, 500 E Street, S.W., Washington, D.C. 20436, telephone (202) 205-2737. 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, S.W., Washington, D.C. 20436, telephone 202-205-2000. General information concerning the Commission may also be obtained by accessing its Internet server (http://www.usitc.gov). The public record for this investigation may be viewed on the Commission’s electronic docket (EDIS) at http://edis.usitc.gov. Hearing-impaired persons are advised that information on this matter can be obtained by contacting the Commission’s TDD terminal on 202-205-1810.

SUPPLEMENTARY INFORMATION: The Commission instituted this investigation on June 17, 2010, based on a complaint filed by HTC Corporation (“HTC”) of Taiwan. 75 Fed. Reg. 34,484-85 (June 17, 2010). The complaint alleged violations of the Tariff Act of 1930 (19 U.S.C. § 1337) in the importation into the United States, the sale for importation, and sale within the United States after importation of certain portable electronic devices and related software by reason of infringement of various claims of United States Patent Nos. 6,999,800 (“the '800 patent”); 5,541,988 (“the '988 patent”); 6,320,957 (“the '957 patent”); 7,716,505 (“the '505 patent”).
October 17, 2011, the ALJ issued his final ID, finding no violation of section 337 by the respondent. Specifically, the ALJ found that the Commission has subject matter jurisdiction and that Apple did not contest that the Commission has in rem and in personam jurisdiction. The ALJ also found that there was an importation into the United States, sale for importation, or sale within the United States after importation of the accused portable electronic devices and related software. Regarding infringement, the ALJ found that Apple does not infringe claims 1-3 and 8-10 of the 800 patent, claims 1 and 10 of the ’988 patent, claims 8-9 of the ’957 patent and claims 1-2 of the ’505 patent. With respect to invalidity, the ALJ found that the asserted claims are not invalid. Finally, the ALJ concluded that an industry exists within the United States that practices the ’988 and ’957 patents, but not the ’800 and ’505 patents as required by 19 U.S.C. § 1337(a)(2).

On October 31, 2011 HTC filed a petition for review of the ID, which also included a contingent petition for review. Also on October 31, 2011, Apple filed a contingent petition for review. On November 8, 2011, the parties filed responses to the petition and contingent petitions for review.

Having examined the record of this investigation, including the ALJ’s final ID, the petitions for review, and the responses thereto, the Commission has determined to review the final ID in part. Specifically, the Commission has determined to review the ALJ’s findings with respect to the ’800 patent. The Commission also determined to review the ALJ’s construction and finding that the accused portable electronic devices and related software do not meet the “manually operable selector” limitation of independent claim 1 of the ’988 patent and independent claim 8 of the ’957. Having reviewed this limitation, the Commission declines to take position on it. The Commission has determined not to review any other issues in the ID. The investigation is therefore terminated with respect to the ’500, ’988 and ’957 patents.

The parties are requested to brief their positions on the issues under review with reference to the applicable law and the evidentiary record. In connection with its review, the Commission is particularly interested in a response to the following questions:

1. In the Accused iPhones, is the applications processor power management unit (AP PMU) a part of the personal digital assistant (PDA), the mobile phone system, or both?

2. In the Accused iPhones, when the VDD_FAULT_LOWER threshold is met, irrespective of whether the SOC1 threshold is met, does the PDA, the mobile phone system, or both, switch between modes? In the Accused iPhones, when the SOC1 threshold is met, irrespective of whether the VDD_FAULT_LOWER threshold is met, does the PDA, the mobile phone system, or both, switch between modes?
3. Do the claims, specification, or prosecution history require that only one of the systems (i.e., either the mobile phone system or PDA) power off when each of the thresholds is met?

4. Are there separate thresholds in HTC’s domestic industry products that result in the mobile phone system turning off separately from the PDA? If the mobile phone and PDA systems turn off simultaneously, is there record evidence proving that the thresholds are separately set to the same limits?

5. Is claim 1 of the ’800 patent anticipated by the Qualcomm pdQ device? Please explain where each element is present in the pdQ device.

6. Do the Accused iPhones meet the “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitation of claim 1 of the ’800 patent?¹

7. Do the HTC domestic industry products meet the “switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitation of claim 1 of the ’800 patent?

8. Do the Accused iPhones meet the “switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time” limitation of claim 1 of the ’800 patent?

9. Although the Commission has determined to review the ’800 patent in its entirety, can the parties respond to Apple’s argument that, because HTC did not petition for review of the limitations of claim 1 of the ’800 patent on which the ALJ made no findings concerning infringement, “HTC has therefore waived any argument on review that these claim limitations are present in the accused iPhones?” Respondent Apple Inc.’s Response to HTC’s

¹ Questions 6 and 7 pertain to issues argued by the parties but not addressed in the ID. The Commission’s rules of practice and procedure provide that the initial determination of the ALJ shall include "... conclusions and the reasons or bases therefor necessary for the disposition of all material issues of fact, law, or discretion presented in the record ..." 19 C.F.R. § 210.42(d). The Commission generally anticipates that the ALJs will adjudicate all issues presented in the record.
Petition for Review of Initial Determination at 3. In your response, please reference any relevant Section 337 or Federal Circuit precedent.

In connection with the final disposition of this investigation, the Commission may (1) issue an order that could result in the exclusion of the subject articles from entry into the United States, and/or (2) issue one or more cease and desist orders that could result in the respondent(s) 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 In the Matter of 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 orders 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. 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. The Commission is therefore interested in receiving submissions concerning the amount of the bond that should be imposed if a remedy is ordered.

WRITTEN SUBMISSIONS: The parties to the 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 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 also requested to submit proposed remedial orders for the Commission’s consideration. Complainant is also requested to state the date that the ’800 patent expires and the HTSUS numbers under which the accused products are imported. The written submissions and proposed remedial orders must be filed no later than close of business on Friday, December 30, 2011. Reply submissions must be filed no later than the close of business on Friday, January 6, 2012. No further submissions on these issues will be permitted unless otherwise ordered by the Commission. The page limit for the parties’ initial submissions on the questions posed by the Commission is 50 pages. The parties reply submissions, if any, are limited to 25 pages.
Persons filing written submissions must file on or before the deadlines stated above and by noon the following business day submit 8 true copies thereof with the Office of the Secretary. Any person desiring to submit a document to the Commission in confidence must request confidential treatment unless the information has already been granted such treatment during the proceedings. All such requests should be directed to the Secretary of the Commission and must include a full statement of the reasons why the Commission should grant such treatment. See 19 C.F.R. § 210.6. Documents for which confidential treatment by the Commission is sought will be treated accordingly. All non-confidential written submissions will be available for public inspection on EDIS.


By order of the Commission.

James R. Holbein
Secretary to the Commission

Issued: December 16, 2011
CERTIFICATE OF SERVICE

I, James R. Holbein, hereby certify that the attached NOTICE has been served by hand upon the Commission Investigative Attorney, Jeffrey T. Hsu, Esq., and the following parties as indicated, on December 16, 2011.

James R. Holbein, Secretary
U.S. International Trade Commission
500 E Street, SW
Washington, DC 20436

On Behalf of Complainant HTC Corp.:
Thomas L. Jarvis, Esq.
FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER, LLP
901 New York Avenue, NW
Washington, DC 20001

On Behalf of Respondent Apple Inc.:
V. James Adduci, II, Esq.
ADDUCI, MASTRIANI & SCHAUMBERG, L.L.P.
1200 Seventeenth Street, N.W., Fifth Floor
Washington, DC 20036
In the Matter of
CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE
Inv. No. 337-TA-721

INITIAL DETERMINATION ON VIOLATION OF SECTION 337 AND RECOMMENDED DETERMINATION ON REMEDY AND BOND

Acting Chief Administrative Law Judge Charles E. Bullock

(October 17, 2011)

Appearances:

For the Complainant HTC Corp.

Thomas L. Jarvis, Esq.; Elizabeth A. Niemeyer, Esq.; Anand K. Sharma, Esq.; Paul Goulet, Esq.; Houtan Esfahani, Esq.; Abhay A. Watwe, Ph.D., Esq.; Christopher T. Blackford, Esq.; Cecelia Peniza, Esq.; and Benjamin Cassady, Esq. of Finnegan, Henderson, Farabow, Garrett & Dunner, LLP from Washington, DC

Stephen E. Kabakoff, Esq. of Finnegan, Henderson, Farabow, Garrett & Dunner, LLP from Atlanta, GA

Darren M. Jiron, Esq.; and Umar Arshad, Esq. of Finnegan, Henderson, Farabow, Garrett & Dunner, LLP from Reston, VA

John R. Alison, Esq. of Finnegan, Henderson, Farabow, Garrett & Dunner, LLP from Shanghai, China

Robert Van Nest, Esq.; Steven K. Taylor, Esq.; and Ajay S. Krishnan, Esq. of Keker & Van Nest LLP from San Francisco, CA

For the Respondent Apple Inc.

Aaron Wainscoat, Esq.; Mark Fowler, Esq.; and Erik R. Fuehrer, Esq. of DLA Piper LLP (US) from East Palo Alto, CA

Tiffany C. Miller, Esq.; and Robert C. Williams, Esq. of DLA Piper LLP (US) from San Diego, CA
Elizabeth Day, Esq.; David Alberti, Esq.; Clayton Thompson, Esq.; and Yakov Zolotorev, Esq. of Feinberg Day Alberti & Thompson LLP from Palo Alto, CA

Jonathan J. Engler, Esq.; and Rowan E. Morris, Esq. of Adduci, Mastriani & Schaumberg, LLP from Washington, DC

For the Commission Investigative Staff

Lynn I. Levine, Esq., Director; Thomas S. Fusco, Esq., Supervisory Attorney; and Jeffrey Hsu, Esq., Investigative Attorney of the Office of Unfair Import Investigations, U.S. International Trade Commission from Washington, DC
TABLE OF CONTENTS

I. INTRODUCTION ................................................................. 1
   A. Procedural History ............................................................. 1
   B. The Parties .......................................................................... 2
      1. HTC ................................................................................. 2
      2. Apple Inc. ......................................................................... 2
   C. Overview of the Technology ............................................... 2
   D. The Patents at Issue ......................................................... 3
      1. The Dialer Patents .......................................................... 3
         a) U.S. Patent No. 5,541,988 ........................................... 3
         b) U.S. Patent No. 6,320,957 ........................................... 3
      2. Power Management Patents ........................................... 4
         a) U.S. Patent No. 6,999,800 ........................................... 4
         b) U.S. Patent No. 7,716,505 ........................................... 4
   E. The Products at Issue ......................................................... 4

II. IMPORTATION OR SALE ...................................................... 5

III. JURISDICTION ................................................................. 5
   A. Subject Matter Jurisdiction ............................................... 5
   B. Personal and In Rem Jurisdiction ....................................... 6

IV. RELEVANT LAW ............................................................... 6
   A. Infringement ..................................................................... 6
      1. Literal Infringement ..................................................... 6
      2. Doctrine of Equivalents ................................................. 7
      3. Indirect Infringement ..................................................... 7
         a) Induced Infringement ............................................... 8
         b) Contributory Infringement ...................................... 8
   B. Validity ........................................................................... 9
      1. Anticipation (35 U.S.C. § 102) ....................................... 9
      2. Obviousness (35 U.S.C. § 103) ..................................... 10
   C. Domestic Industry .......................................................... 12
      1. Economic Prong .......................................................... 13
      2. Technical Prong .......................................................... 13

V. THE DIALER PATENTS ....................................................... 14
   A. Overview ......................................................................... 14
      1. Asserted Claims .......................................................... 14
         a) The '988 Patent ......................................................... 14
         b) The '957 Patent ......................................................... 15
      2. Claim Construction ...................................................... 15
   B. Infringement ................................................................. 16
      1. Claim 1 of the '988 Patent and Claim 8 of the '957 Patent .. 16
         a) Literal Infringement ................................................ 16
i) “a keypad to generate a sequence of indicia corresponding to a telephone number” ..............................18
ii) “a manually operable scanning device to scan indicia on said selected page on said display/a manually operable scanning control device to control the scanning of indica [sic] of said selected page on said electronic display device” .............................................................23
iii) “a manually operable selector to select one of said indicia on said display for dialing” ................................29

b) Infringement under the Doctrine of Equivalents .................................32
   i) “a keypad to generate a sequence of indicia corresponding to a telephone number” .........................32
   ii) “a manually operable scanning device to scan indicia on said selected page on said display/a manually operable scanning control device to control the scanning of indica [sic] of said selected page on said electronic display device” .............................................................35
   iii) “a manually operable selector to select one of said indicia on said display for dialing” .......................37
c) Induced Infringement ..........................................................................................................................39

2. Dependent Claims .................................................................................................................................39
   a) Claim 10 of the ’988 Patent ..................................................................................................................39
   b) Claim 9 of the ’957 Patent ..................................................................................................................40

C. Validity ..................................................................................................................................................40
   1. Priority Date .........................................................................................................................................40
      a) HTC’s “Telephone Dialer” Argument ...............................................................................................44
      b) Apple MacPhone and the NorTel Meridian TeleCenter ..................................................................47
   3. Obviousness Under 35 U.S.C. § 103(a) .............................................................................................50

D. Domestic Industry – Technical Prong ..................................................................................................51

VI. THE ’800 PATENT ..................................................................................................................................54
A. Overview ..................................................................................................................................................54
   1. Asserted Claims .....................................................................................................................................54
   2. Claim Construction ..................................................................................................................................56

B. Infringement .............................................................................................................................................57
   1. Direct Infringement ..................................................................................................................................57
      a) Claim 1 .................................................................................................................................................57
         i) “switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time” ..................................................................................58
         ii) “implementing a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off”
mode when the detected amount is less than a second threshold” ...60
b) Claims 2, 4, 6, 10, 11, 14, and 15 ...62
2. Contributory and Induced Infringement ...63
C. Validity ...63
1. Ordinary Skill in the Art ...63
2. Priority Date ...64
3. Anticipation ...64
a) HTC Wallaby Smartphone ...65
i) Claim 1 ...66
ii) Claims 2, 4, 6, 10, 11, 14, and 15 ...67
b) Qualcomm pdQ Smartphone ...68
i) Claim 1 ...68
ii) Claims 2, 4, 6, 10, and 11 ...70
c) Kyocera 6035 Smartphone ...71
i) Claim 1 ...71
ii) Claims 2, 4, 6, 10, 11, 14, and 15 ...74
4. Obviousness ...74
D. Domestic Industry – Technical Prong ...75
1. “implementing a power detection method comprising steps of:
detecting an amount of power of a source in the power system;
switching the mobile phone system to off mode when the detected
amount is less than a first threshold; and switching the PDA system to
off mode when the detected amount is less than a second threshold” ...76
2. Claim 2 ...78
3. Conclusion ...79
VII. THE ’505 PATENT ...79
A. Overview ...79
1. Asserted Claims ...79
2. Claim Construction ...80
B. Infringement ...81
1. Direct Infringement ...81
a) Claim 1 ...81
 i) “maintaining only sufficient power to restore the
device” ...82
 ii) “when the remaining power of the battery exceed [sic]
the amount, supplying power to the volatile memory
and accessing data from the non-volatile memory to
initiate the normal device operation” ...84
 iii) “determining whether the remaining power of the
battery exceeds an amount required for a normal device
operation” ...87
b) Claim 2 ...90
2. Contributory and Induced Infringement ...90
**LIST OF ABBREVIATIONS**

The following abbreviations may be used in this Initial Determination:

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>CDX</td>
<td>Complainant’s demonstrative exhibit</td>
</tr>
<tr>
<td>CFF</td>
<td>Complainant’s proposed findings of fact</td>
</tr>
<tr>
<td>CIB</td>
<td>Complainant’s initial post-hearing brief</td>
</tr>
<tr>
<td>CPX</td>
<td>Complainant’s physical exhibit</td>
</tr>
<tr>
<td>CRB</td>
<td>Complainant’s reply post-hearing brief</td>
</tr>
<tr>
<td>CX</td>
<td>Complainant’s exhibit</td>
</tr>
<tr>
<td>Dep</td>
<td>Deposition</td>
</tr>
<tr>
<td>JX</td>
<td>Joint Exhibit</td>
</tr>
<tr>
<td>PHB</td>
<td>Pre-hearing brief</td>
</tr>
<tr>
<td>RDX</td>
<td>Respondent’s demonstrative exhibit</td>
</tr>
<tr>
<td>RIB</td>
<td>Respondent’s initial post-hearing brief</td>
</tr>
<tr>
<td>RPX</td>
<td>Respondent’s physical exhibit</td>
</tr>
<tr>
<td>RRB</td>
<td>Respondent’s reply post-hearing brief</td>
</tr>
<tr>
<td>RX</td>
<td>Respondent’s exhibit</td>
</tr>
<tr>
<td>SIB</td>
<td>Staff’s initial post-hearing brief</td>
</tr>
<tr>
<td>SRB</td>
<td>Staff’s reply post-hearing brief</td>
</tr>
<tr>
<td>Tr.</td>
<td>Transcript</td>
</tr>
</tbody>
</table>
Pursuant to the Notice of Investigation, this is the Initial Determination in the matter of Certain Portable Electronic Devices and Related Software, Investigation No. 337-TA-721.

For the reasons stated herein, the undersigned has determined that no violation of section 337 of the Tariff Act of 1930, as amended, has been found in the importation into the United States, the sale for importation, or the sale within the United States after importation of certain portable electronic devices and related software by reason of infringement of one or more of claims 1 and 10 of U.S. Patent No. 5,541,988; claims 8 and 9 of U.S. Patent No. 6,320,957; claims 1, 2, 4, 6, 10, 11, 14, and 15 of U.S. Patent No. 6,999,800; and claims 1 and 2 of U.S. Patent No. 7,716,505. The undersigned has further determined that the asserted patents are valid, that a domestic industry in the United States exists that practices U.S. Patent Nos. 5,541,988 and 6,320,957, and that a domestic industry in the United States does not exist that practices U.S. Patent Nos. 6,999,800 and 7,716,505.
I. INTRODUCTION

A. Procedural History

This Investigation was instituted on June 11, 2010, and on June 17, 2010, the Notice of Investigation was published in the Federal Register. See 75 Fed. Reg. 34,484-85 (June 17, 2010). Specifically, the Commission instituted this Investigation to determine:

Whether there is a violation of subsection (a)(1)(B) of section 337 in the importation into the United States, the sale for importation, or the sale within the United States after importation of certain portable electronic devices or related software that infringe one or more of claims 1 – 4, 6, 10, 11, 14, and 15 of U.S. Patent No. 6,999,800; claims 1 and 10 of U.S. Patent No. 5,541,988; claims 20, 21, and 30 of U.S. Patent No. 6,058,183; claims 1, 2, 8, 9, 39, and 42 – 44 of U.S. Patent No. 6,320,957; and claims 1 – 3 of U.S. Patent No. 7,716,505, and whether an industry in the United States exists as required by subsection (a)(2) of section 337.

Id.

Complainant is HTC Corporation (“HTC”). Respondent is Apple Inc. (“Apple”). The Commission Investigative Staff (“Staff”) is also a party to the Investigation.

On October 25 – 26, 2010, the undersigned held a two-day Markman hearing. The undersigned issued the claim construction order on January 28, 2011. (See Order No. 29 (Jan. 28, 2011).)

On November 8, 2010, the undersigned issued an initial determination granting HTC’s motion for partial termination of the Investigation with respect to claim 3 of U.S. Patent No. 7,716,505, claims 1 and 2 of U.S. Patent No. 6,320,957, and all asserted claims of U.S. Patent No. 6,058,183. (See Order No. 10 (Nov. 8, 2010).) The Commission determined not to review said initial determination on November 29, 2010. (See Notice of Comm’n Determination Not to Review an Initial Determination Granting Complainant’s Unopposed Motion to Terminate the
On March 2, 2011, the undersigned issued an initial determination granting HTC’s unopposed motion for partial termination of the Investigation with respect to claims 39 and 42–44 of U.S. Patent No. 6,320,957. (See Order No. 37 (Mar. 2, 2011).) The Commission determined not to review the initial determination. (See Notice of Comm’n Determination Not to Review an Initial Determination Granting Complainant’s Unopposed Motion to Terminate the Investigation as to Claims 39 and 42-44 of U.S. Patent No. 6,320,957 (Mar. 17, 2011).)

The evidentiary hearing was held May 9 – 16, 2011.

B. The Parties

1. HTC

HTC is a Taiwanese corporation with a principal place of business in Taoyuan City, Taiwan. (Compl. ¶ 6.) HTC develops and manufactures smartphones and other portable electronic devices. (Id. ¶ 8.) In addition to its own line of proprietary mobile handsets, HTC products are also sold under the brand names of other companies such as Hewlett Packard/Compaq and Palm. (Id.)

2. Apple Inc.

Apple is a California corporation, headquartered in Cupertino, California. (Resp. to Compl. ¶ 11.) Apple designs, develops, imports and sells portable electronic devices, including the iPhone, iPod Touch and iPad products. (Id. at ¶ 12.)

C. Overview of the Technology

The technology at issue generally relates to hardware and software used in a variety of electronic devices, including portable electronic devices. (Compl. ¶ 13; Resp. to Compl. ¶ 13.)
D. The Patents at Issue

1. The Dialer Patents

U.S. Patent Nos. 5,541,988 (the "'988 patent") and 6,320,957 (the "'957 patent") relate generally to "advanced use of the telephone directory in a telephone system for improved human interface and better access, retrieval and use of the data stored in [the] directory." (JX-3 at 1:59-62; JX-4 at 1:59-62.)

a) U.S. Patent No. 5,541,988

The '988 patent is entitled "Telephone Dialler With A Personalized Page Organization Of Telephone Directory Memory." (JX-3.) The '988 patent issued on July 30, 1996 to named inventor Georgi H. Draganoff. (Id.) The '988 patent has 24 claims of which claims 1 and 10 are asserted against Apple. (CX-1407.3C at Q/A 33.) Claim 1 is an independent claim. Claim 10 depends from claim 1.

b) U.S. Patent No. 6,320,957

The '957 patent is entitled "Telephone Dialler With Easy Access Memory." (JX-4.) The '957 patent issued on November 20, 2001 to named inventor Georgi H. Draganoff, and was subsequently assigned to GEZ Microsystems, Inc. (Id.) The '957 patent has 44 claims of which claims 8 and 9 are asserted against Apple. (CX-1407.3C at Q/A 33.) Claim 8 is an independent claim from which claim 9 depends.

---

1 HTC Corp. is presently the owner, by assignment, of the patents-in-suit. (Compl. ¶ 2; JX-9 – JX-16.)
2 The Dialer Patents are a group of related patents. The '957 patent is a continuation of the '988 patent and thus, both patents share the same specification and the same figures.
3 The word "dialler" with two Ls reflects the British spelling. (See 10/25/10 Tr. at 18:22-19.)
2. Power Management Patents

The technology of the U.S. Patent Nos. 6,999,800 (the "'800 patent") and 7,716,505 (the "'505 patent") generally relates to power management for portable electronic devices. (JX-1; JX-2.)

a) U.S. Patent No. 6,999,800

The '800 patent is entitled "Method For Power Management Of A Smart Phone." (JX-1.) The '800 patent issued on February 14, 2006 to named inventors Yu-Chun Peng; Ching-Hsiang Chang; Tzu-Hsun Tung; and Hsi-Cheng Yeh, and was subsequently assigned to High Tech Computer Corp. (Id.) The '800 patent has 15 claims of which claims 1 – 4, 6, 10, 11, 14, and 15 are asserted against Apple. Claim 1 is an independent claim. Claims 2 – 4, 6, 10, 11, 14, and 15 are dependent claims.

b) U.S. Patent No. 7,716,505

The '505 patent is entitled "Power Control Methods for a Portable Electronic Device." (JX-2.) The '505 patent issued on May 11, 2010 to named inventors Chun-Seng Chao, Ching-Tsung Lai, and Chung-An Chien, and is assigned to HTC. (Id.) The '505 patent has 4 claims of which claims 1 and 2 are asserted against Apple. Claim 1 is an independent claim, and claim 2 depends from claim 1.

E. The Products at Issue

The accused Apple products are various models of the iPhone, iPad and iPod Touch devices. (SIB at 4.) Specifically, HTC has accused the original iPhone [ ] iPhone 3G [ ] iPhone 3GS [ ] iPhone 4 [ ] and CDMA iPhone [ ] of infringing both the '800 patent and the '505 patent, and HTC has also accused the first generation iPad, including the
Wi-Fi and 3G models \[ \] the iPad2, including the Wi-Fi and 3G models \[ \]
\[ \] and the first, second, third and fourth generations of the iPod Touch \[ \]
\[ \] of infringing the '505 patent. (CX-1405.2C at Q/A 362; CX-1405.2C at Q/A 2525-2527.) HTC has accused the original iPhone \[ \] iPhone 3G \[ \] iPhone 3GS \[ \] iPhone 4 \[ \] CDMA iPhone \[ \] the first generation iPad, including the Wi-Fi and 3G models \[ \] the iPad2, including the Wi-Fi and 3G models \[ \]
and the first, second, third, and fourth generation iPod Touch models \[ \]
of infringing the '988 and '957 patents. (CX-1407.3C at Q/A at 23, 32, 196-98.) The accused iPad and iPod Touch products are accused only under a theory of induced infringement and only as used in combination with one or more of the following third-party VoIP applications: Whistle Phone, Acrobits Softphone, iCall, Globallinx, iStarSip and Sipgate. (Id. at Q/A 23, 74, 371-76.)

II. IMPORTATION OR SALE

The importation or sale requirement of section 337 has been satisfied. The parties have entered into a joint stipulation, wherein Apple has stipulated that “at least one unit of each of the following Apple products has been imported, sold for importation, and/or sold after importation into the United States by Apple: [\]

]” (CX-714 at ¶ 4.)

III. JURISDICTION

A. Subject Matter Jurisdiction

As set forth supra, Apple has stipulated that it has imported into the United States, sold for importation, and/or sold after importation into the United States certain portable electronic devices. (See CX-714 at ¶¶ 3-4.) The undersigned therefore find that the Commission

**B. Personal and In Rem Jurisdiction**

Apple does not contest that the Commission has *in personam* and *in rem* jurisdiction. (RIB at 3.)

**IV. RELEVANT LAW**

**A. Infringement**

Determining whether a patent is infringed is a two-step process. First, the court must construe the scope of the asserted claim. Second, the accused product or process is compared to the claim as construed to determine whether it contains each limitation of the claim, either literally or by a substantial equivalent. *Freedman Seating Co. v. Am. Seating Co.*, 420 F.3d 1350, 1356-57 (Fed. Cir. 2005). In a section 337 investigation, the complainant bears the burden of proving infringement of the asserted patent claims by a preponderance of the evidence. *Spansion, Inc. v. Int’l Trade Comm’n*, 629 F.3d 1331, 1349 (Fed. Cir. 2010). This standard “requires proving that infringement was more likely than not to have occurred.” *Warner-Lambert Co. v. Teva Pharm. USA, Inc.*, 418 F.3d 1326, 1341 n.15 (Fed. Cir. 2005).

1. **Literal Infringement**

Literal infringement is a question of fact. *Finisar Corp. v. DirecTV Grp., Inc.*, 523 F.3d 1323, 1332 (Fed. Cir. 2008). Literal infringement requires the patentee to prove that the accused device contains each limitation of the asserted claim(s). If any claim limitation is absent, there is no literal infringement of that claim as a matter of law. *Bayer AG v. Elan Pharm. Research Corp.* 212 F.3d 1241, 1247 (Fed. Cir. 2000).
2. **Doctrine of Equivalents**

Where literal infringement is not found, infringement nevertheless can be found under the doctrine of equivalents. Determining infringement under the doctrine of equivalents “requires an intensely factual inquiry.” *Vehicular Tech. Corp. v. Titan Wheel Int'l, Inc.*, 212 F.3d 1377, 1381 (Fed. Cir. 2000). The Supreme Court has described the essential inquiry of the doctrine of equivalents analysis in terms of whether the accused product or process contains elements identical or equivalent to each claimed element of the patented invention. *Warner-Jenkinson Co., Inc. v. Hilton Davis Chem. Co.*, 520 U.S. 17, 40 (1997). The Federal Circuit applies two articulations of the test for equivalents, as one phrasing may be more suitable for particular fact patterns or technologies:

Under the insubstantial differences test, ‘[a]n element in the accused device is equivalent to a claim limitation if the only differences between the two are insubstantial.’ Alternatively, under the function-way-result test, an element in the accused device is equivalent to a claim limitation if it ‘performs substantially the same function in substantially the same way to obtain substantially the same result.’

*Voda v. Cordis Corp.*, 536 F.3d 1311, 1326 (Fed. Cir. 2008) (citations omitted). In *Warner-Jenkinson*, the Supreme Court noted that the doctrine of equivalents is subject to several limitations, including applying the doctrine to individual elements of a claim and not to the invention as a whole. *Warner-Jenkinson*, 520 U.S. at 29.

3. **Indirect Infringement**

Indirect infringement may be either induced or contributory. Direct infringement must first be established in order for a claim of indirect infringement to prevail. *BMC Res. v. Paymentech*, 498 F.3d 1373, 1379 (Fed. Cir. 2007).
a) Induced Infringement

Section 271(b) of the Patent Act provides: “Whoever actively induces infringement of a patent shall be liable as an infringer.” 35 U.S.C. §271(b) (2008). To establish liability, the patent holder must prove that “once the defendants knew of the patent, they ‘actively and knowingly aid[ed] and abett[ed] another’s direct infringement.’” DSU Med. Corp. v. JMS Co., Ltd. 471 F.3d 1293,1305 (Fed. Cir. 2006) (en banc) (citations omitted). A finding of induced infringement requires “evidence of culpable conduct, directed to encouraging another’s infringement, not merely that the inducer had knowledge of the direct infringer’s activities.” DSU, 471 F.3d at 1306. Although §271(b) requires knowledge that the induced acts constitute patent infringement, the Supreme Court has held that liability will also attach when the defendant is willfully blind. Global-Tech Appliances, Inc. v. SEB S.A., 131 S. Ct. 2060, 2068-2069 (2011). The burden is on the complainant to prove that the respondent had the specific intent and took action to induce infringement. DSU, 471 F.3d at 1305-06. Intent may be proven by circumstantial evidence. Lucent Tech., Inc. v. Gateway, Inc., 580 F.3d 1301, 1322 (Fed. Cir. 2009).

b) Contributory Infringement

Under 35 U.S.C. §271(c), the seller of a component especially designed for use in a patented invention may be liable as a contributory infringer, provided the component is not a staple article of commerce suitable for substantial non-infringing use. Ricoh Co., Ltd. v. Quanta Computer Inc., 550 F. 3d 1325, 1337 (Fed. Cir. 2008). In a section 337 case a complainant alleging contributory infringement must show inter alia: (1) there is an act of direct infringement in violation of section 337; (2) the accused device has no substantial non-infringing uses; and (3) the accused infringer imported, sold for importation, or sold after importation within the United
States, the accused components that contributed to another’s direct infringement. *Spansion*, 629 F.3d at 1353.

**B. Validity**

A patent is presumed valid. 35 U.S.C. § 282; *Microsoft Corp. v. i4i Ltd. P’ship*, 131 S.Ct. 2238, 2242 (2011). A respondent who has raised patent invalidity as an affirmative defense has the burden of overcoming this presumption by clear and convincing evidence. *Microsoft*, 131 S. Ct. at 2238. Since the claims of a patent measure the invention at issue, the claims must be interpreted and given the same meaning for purposes of both validity and infringement analyses. *Amazon.com, Inc. v. Barnesandnoble.com, Inc.*, 239 F. 3d 1343, 1351 (Fed. Cir. 2001). As with an infringement analysis, an analysis of invalidity involves two steps: determining the scope of the claim and comparing the properly construed claim with the prior art to determine whether the claimed invention is anticipated and/or rendered obvious.


A patent may be found invalid as anticipated under 35 U.S.C. § 102(a) if “the invention was known or used by others in this country, or patented or described in a printed publication in this country, or patented or described in a printed publication in a foreign country, before the invention thereof by the applicant for patent.” 35 U.S.C. § 102(a). A patent may be found invalid as anticipated under 35 U.S.C. § 102(b) if “the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of the application for patent in the United States.” 35 U.S.C. § 102(b). Under 35 U.S.C. §102(e), a patent is invalid as anticipated if “the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent.” 35 U.S.C. §102(e). Anticipation is a
question of fact that must be established by clear and convincing evidence. *Tessera, Inc. v. Int'l Trade Comm'n*, 646 F.3d 1357, 1366 (Fed. Cir. 2011) (citing *Sanofi-Synthelabo v. Apotex Inc.*, 550 F.3d 1075, 1082 (Fed. Cir. 2008)).

Under 35 U.S.C. § 102, a claim is anticipated and therefore invalid when “the four corners of a single, prior art document describe every element of the claimed invention, either expressly or inherently, such that a person of ordinary skill in the art could practice the invention without undue experimentation.” *Advanced Display Sys., Inc. v. Kent State Univ.*, 212 F.3d 1272, 1282 (Fed. Cir. 2000), *cert. denied*, 532 U.S. 904 (2001). A finding of inherent anticipation “is appropriate only when the reference discloses prior art that must necessarily include the unstated limitation.” *King Pharm., Inc. v. Eon Labs, Inc.*, 616 F.3d 1267, 1274 (Fed. Cir. 2010). To be considered anticipatory, the prior art reference must be enabling and describe the applicant’s claimed invention sufficiently to have placed it in possession of a person of ordinary skill in the field of the invention. *Helifix Ltd. v. Blok-Lok, Ltd.*, 208 F.3d 1339, 1346 (Fed. Cir. 2000).


Under 35 U.S.C. §103 a patent may be found invalid for obviousness if “the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.” 35 U.S.C. §103(a). Because obviousness is determined at the time of invention, rather than the date of application or litigation, “[t]he great challenge of the obviousness judgment is proceeding without any hint of hindsight.” *Star Scientific, Inc. v. R.J. Reynolds Tobacco Co.*, No. 2010–1183, 2011 WL 3768983, at *9 (Fed. Cir. Aug. 26, 2011).
When a patent is challenged as obvious, the critical inquiry in determining the differences between the claimed invention and the prior art is whether there is a reason to combine the prior art references. *KSR Int'l Co. v. Teleflex, Inc.*, 550 U.S. 398, 417-418 (2007). In *KSR*, the Supreme Court rejected the Federal Circuit’s rigid application of the teaching-suggestion-motivation test. The Court stated that “it can be important to identify a reason that would have prompted a person of ordinary skill in the relevant field to combine the elements in the way the claimed new invention does.” *KSR*, 550 U.S. at 418. The Court described a more flexible analysis:

> Often, it will be necessary for a court to look to interrelated teachings of multiple patents; the effects of demands known to the design community or present in the marketplace; and the background knowledge possessed by a person having ordinary skill in the art, all in order to determine whether there was an apparent reason to combine the known elements in the fashion claimed by the patent at issue. . . . As our precedents make clear, however, the analysis need not seek out precise teachings directed to the specific subject matter of the challenged claim, for a court can take account of the inferences and creative steps that a person of ordinary skill in the art would employ.

*KSR*, 550 U.S. at 418. The Federal Circuit has since held that when a patent is challenged as obvious, based on a combination of several prior art references, “the burden falls on the patent challenger to show by clear and convincing evidence that a person of ordinary skill in the art would have had reason to attempt to make the composition or device, or carry out the claimed process, and would have had a reasonable expectation of success in doing so.” *PharmaStem Therapeutics, Inc. v. ViaCell, Inc.*, 491 F.3d 1342, 1360 (Fed. Cir. 2007) (citations omitted). The reason to attempt “need not always be written references but may be found within the knowledge and creativity of ordinarily skilled artisans.” *Ortho-McNeil Pharm., Inc. v. Mylan Lab., Inc.*, 520 F.3d 1358, 1365 (Fed. Cir. 2008).
Obviousness is a determination of law based on underlying determinations of fact. *Star II*, 2011 WL 3768983, at *8. The factual determinations behind a finding of obviousness include: (1) the scope and content of the prior art, (2) the level and content of the prior art, (3) the differences between the claimed invention and the prior art, and (4) secondary considerations of non-obviousness. *KSR*, 550 U.S. at 399 (citing *Graham v. John Deere Co.*, 383 U.S. 1, 17 (1966)). These factual determinations are referred to collectively as the “Graham factors.” Secondary considerations of non-obviousness include commercial success, long felt but unresolved need, and the failure of others. *Id.* When present, secondary considerations “give light to the circumstances surrounding the origin of the subject matter sought to be patented,” but they are not dispositive on the issue of obviousness. *Geo. M. Martin Co. v. Alliance Mach. Sys. Int’l.*, 618 F. 3d 1294, 1304-06 (Fed. Cir. 2010). A court must consider all of the evidence from the Graham factors before reaching a decision on obviousness. For evidence of secondary considerations to be given substantial weight in the obviousness determination, its proponent must establish a nexus between the evidence and the merits of the claimed invention. *W. Union Co. v. MoneyGram Payment Sys. Inc.*, 626 F.3d 1361, 1372-73 (Fed. Cir. 2010) (citing *In re GPAC Inc.*, 57 F.3d 1573, 1580 (Fed. Cir. 1995)).

**C. Domestic Industry**

In a patent-based complaint, a violation of section 337 can be found “only if an industry in the United States, relating to the articles protected by the patent . . . concerned, exists or is in the process of being established.” 19 U.S.C. §1337(a)(2). Under Commission precedent, this “domestic industry requirement” of section 337 consists of an economic prong and a technical prong. *Certain Stringed Musical Instruments and Components Thereof*, Inv. No. 337-TA-586, Comm’n Op. at 12-14, 2009 WL 5134139 (U.S.I.T.C. Dec. 2009). The complainant bears the

1. **Economic Prong**

Section 337(a)(3) sets forth the following economic criteria for determining the existence of a domestic industry in such investigations:

(3) For purposes of paragraph (2), an industry in the United States shall be considered to exist if there is in the United States, with respect to the articles protected by the patent, copyright, trademark, mask work, or design concerned –

(A) significant investment in plant and equipment;

(B) significant employment of labor or capital; or

(C) substantial investment in its exploitation, including engineering, research and development, or licensing.

Given that these criteria are listed in the disjunctive, satisfaction of any one of them will be sufficient to meet the economic prong of the domestic industry requirement. *Certain Integrated Circuit Chipsets and Prods. Containing Same*, Inv. No. 337-TA-428, Order No. 10, Initial Determination (unreviewed) (May 4, 2000).

2. **Technical Prong**

The technical prong of the domestic industry requirement is satisfied when the complainant in a patent-based section 337 investigation establishes that it is practicing or exploiting the patents at issue. See 19 U.S.C. §1337 (a)(2) and (3); *Certain Microsphere Adhesives, Process for Making Same and Prods. Containing Same, Including Self-Stick Repositionable Notes*, Inv. No. 337-TA-366, Comm’n Op. at 8, 1996 WL 1056095 (U.S.I.T.C. Jan. 16, 1996). “The test for satisfying the ‘technical prong’ of the industry requirement is
essentially same as that for infringement, i.e., a comparison of domestic products to the asserted claims.” *Alloc, Inc. v. Int'l Trade Comm'n*, 342 F.3d 1361, 1375 (Fed. Cir. 2003). To prevail, the patentee must establish by preponderance of the evidence that the domestic product practices one or more claims of the patent either literally or under the doctrine of equivalents. *Bayer*, 212 F.3d at 1247. It is sufficient to show that the products practice any claim of that patent, not necessarily an asserted claim of that patent. *Certain Microsphere Adhesives*, Comm’n Op. at 7-16.

V. **THE DIALER PATENTS**

A. **Overview**

1. **Asserted Claims**

   a) **The ’988 Patent**

   HTC is asserting claims 1 and 10, which read as follows:

   1. A telephone dialler comprising a keypad to generate a sequence of indicia corresponding to a telephone number, a memory to store said sequences of indicia to provide a telephone directory, a central processing unit (CPU) to access said directory to store and retrieve indicia therein, and a display to display sequences retrieved from said directory by a page selection device, said sequences of said indicia in said directory being collected into discrete pages each of which may be selected for retrieval from said memory by a page selection device, said CPU displaying at least one of said sequences on said display, a manually operable scanning device to scan indicia of said selected page on said display, and a manually operable selector to select one of said indicia on said display for dialling.

   10. A telephone dialler as claimed in claim 1, having two modes of operation, a first mode where the telephone number is dialed by means of manual successive depressions of the buttons of said numerical keypad corresponding to the dialed number, and a second mode, wherein the telephone number is selected by means of page and inside page address selector devices loaded into a buffer and dialed automatically by means of the CPU, wherein switching from said first mode to said second mode is performed by the means of the CPU, whenever said page selection device is activated and switching from said second mode to said first mode is performed also by means of the CPU, whenever any of said buttons of said numerical keypad is first depressed.

   (JX-3 at 9:3-18, 9:65-10:10.)
b) The ’957 Patent

HTC is asserting claims 8 and 9, which read as follows:

8. A telephone dialler comprising: a keypad to generate a sequence of indicia corresponding to a telephone number; a page selection device; a memory to store said sequences of indicia to provide a telephone directory, said sequences of said indicia in said directory being collected into discrete pages, each of which may be selected for retrieval from said memory by use of said page selection device; an electronic display device to display sequences retrieved from said directory; a manually operable scanning control device to control the scanning of indica [sic] of said selected page on said electronic display device; a central processing unit (CPU) to access said directory to store and retrieve indicia therein in response to operation of said scanning control device, said CPU displaying at least one of said sequences on said electronic display device; and a manually operable selector to select one of said indicia on said display for dialling.

9. The dialler of claim 8 wherein the activation of said page selection devices causes page identification data to be displayed on said display device.

(JX-4 at 10:10-33.)

2. Claim Construction

On January 28, 2011, Order No. 29 issued construing certain claim limitations of the Dialer patents. (See Order No. 29 at 54-103 (Jan. 28, 2011).) The construction of those limitations is set forth below:

<table>
<thead>
<tr>
<th>Claim Term</th>
<th>Construction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Claim 1 (’988); Claim 8 (’957) Pages</td>
<td>more than one page</td>
</tr>
<tr>
<td>Claim 1 (’988); Claim 8 (’957) discrete pages</td>
<td>separate pages</td>
</tr>
<tr>
<td>Claim 1 (’988); Claim 8 (’957) Keypad</td>
<td>data input device in which the keys are arranged in a manner similar to the numbers on a standard pushbutton telephone</td>
</tr>
<tr>
<td>Claim 1 (’988); Claim 8 (’957) Page</td>
<td>a collection of information from a telephone directory</td>
</tr>
<tr>
<td>Claim 1 (’988) to scan indicia of said selected page on said display</td>
<td>to look through the telephone directory entries that are stored in the selected page that is displayed</td>
</tr>
<tr>
<td>Claim 8 (’957) to control the scanning of indica [sic] of said selected page on said electronic display device</td>
<td>to control the display of the telephone directory entries that are stored in the selected page</td>
</tr>
</tbody>
</table>
### Claim Term Construction

<table>
<thead>
<tr>
<th>Claim</th>
<th>Term</th>
<th>Construction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Claim 1 ('988)</td>
<td>manually operable scanning device</td>
<td>a sliding or rotary-type control used to choose information on a particular page</td>
</tr>
<tr>
<td>Claim 8 ('957)</td>
<td>manually operable scanning control device</td>
<td>a sliding or rotary-type control used to look through information on a chosen page</td>
</tr>
<tr>
<td>Claims 1, 10 ('988); Claims 8, 9 ('957)</td>
<td>page selection device</td>
<td>a push button or other discrete part used to select a page</td>
</tr>
<tr>
<td>Claim 10 ('988)</td>
<td>page and inside page address selector devices</td>
<td>a push button or other physical part used to select a page and a sliding or rotary type control used to choose information on a particular page</td>
</tr>
<tr>
<td>Claim 1 ('988); Claim 8 ('957)</td>
<td>manually operable selector</td>
<td>a part moveable by hand used [to select]⁴</td>
</tr>
</tbody>
</table>

### B. Infringement

#### 1. Claim 1 of the '988 Patent and Claim 8 of the '957 Patent⁵

#### a) Literal Infringement

HTC asserts that the evidence adduced at the hearing “unequivocally” shows that the accused Apple products satisfy every element required by the asserted claims. Specifically, HTC argues that “the [a]ccused [p]roducts make and receive phone calls; provide keypads as data input devices that can enter sequences of indicia into memory; display pages of telephone directory information; provide buttons for the selection of these pages, causing the pages to be retrieved from memory; provide sliding or sliding-type controls for scrolling through pages; and provide buttons to select indicia within the pages for dialing.” (CIB at 86; see also CIB at 87-110.) This, HTC contends, is accomplished in the accused products through the use of a

[ ] in conjunction with the running of particular software (i.e., [ ] in conjunction with the VoIP Applications on the accused iPad and iPod Touch

---

⁴ As previously noted, the portion in brackets is the language immediately following “manually operable selector.” It is included to provide context and is not part of the construction of said term.

⁵ All parties agree that claim 1 of the '988 patent and claim 8 of the '957 patent have similar elements that can be analyzed together. (See CIB at 87-88; RIB at 101-145 (analyzing common terms of the Dialer Patents together); SIB at 102.)
products). (CIB at 88-89, 91-112; CRB at 35.)

In HTC’s view, the key dispute is not how the accused products operate, but whether Apple’s use of a touchscreen precludes a finding of infringement. (CIB at 86-87.) HTC disputes Apple’s contention that its touchscreens fall outside the asserted claims because touchscreens [ ] and [ ] arguing that this is contrary to the patents’ teachings, the understanding of persons of skill in the art, and case law. (CIB at 90 (discussing the interchangeability of software and hardware), 90-91 (“Federal courts agree that hardware and software are ‘interchangeable substitutes,’ and that software can, at a minimum, provide the equivalent of hardware”); CRB at 33-35.)

Apple argues that none of the accused products practice the claimed “manually operable scanning device/manually operable scanning control device,” “manually operable selector,” “page selection device,” “keypad,” and “memory to store said sequences of indicia” limitations and thus, the accused products do not infringe the asserted claims of the Dialer patents. (RIB at 111-129.) In particular, Apple asserts that the accused products do not infringe for, inter alia, [ ]

In the Staff’s view, the evidence does not support a finding of infringement. Staff submits that “under a plain reading of the claim terms, the patent specifications and Order No. 29,” the accused products “very clearly” do not infringe claim 1 of the ’988 patent or claim 8 of the ’957 patent. (SIB at 101-102; SRB at 24.) Staff asserts that the accused products do not practice at least three limitations, namely the “keypad to generate a sequence of indicia
corresponding to a telephone number,” “a manually operable scanning device to scan indicia of said selected page on said display,” and “a manually operable selector to select one of said indicia on said display for dialing.” In support thereof, Staff argues that the accused products do not have [ ] (SIB at 108 (citing CX-1407.3C at Q/A 41, 44).) Staff also argues that the capacitive touchscreen of the accused products eliminates the need for any manually operable controls, which in turn, eliminates any need for the claimed “manually operable scanning device” or the claimed “part moveable by hand” for dialing a telephone number. (Id. at 111-116.)

For the reasons set forth infra, the undersigned finds that the accused products, at a minimum, do not practice the “keypad,” “manually operable selector,” and “manually operable scanning device” limitations and thus, do not literally infringe either claim 1 of the '988 patent or claim 8 of the '957 patent.

i) “a keypad to generate a sequence of indicia corresponding to a telephone number”

Asserted claim 1 of the '988 patent and asserted claim 8 of the '957 patent each recite “a keypad to generate a sequence of indicia corresponding to a telephone number,” which has been construed to mean “a data input device in which the keys are arranged in a manner similar to the numbers on a standard pushbutton telephone.” (Order No. 29 at 65; see also JX-3 at 9:3-4; JX-4 at 10:11-12.)

HTC, through its expert, Dr. Wobbrock, identified three virtual keypads as allegedly satisfying this element in the accused iPhones: [1] [ ] [2] the [ ]
722; see also CDX-3211; CDX-3212; CIB at 91-96.) Dr. Wobbrook identified the same three keypads for the accused iPad and iPod Touch devices. (CX-1407.3C at Q/A 80, 964.)

Apple contends that none of these “keypads” are the claimed keypad for each is a [ ] (RIB at 122-127; RRB at 40-42.) In this regard, Dr. Nieh, Apple’s expert, testified that accused products lack the claimed “keypad” because the [ ] (RX-808C at Q/A 32; see also Q/A 43, 53.)

While Staff agrees with HTC that the accused products are capable of displaying virtual keypads, Staff believes that only the [ ] and the [ ] [ ] have keys “arranged in a manner similar to the numbers on a standard pushbutton telephone” as required by the undersigned’s claim construction. (SIB at 106-108; SRB at 24-26.)

The undersigned agrees with HTC and Staff that the evidence demonstrates the accused products are capable of displaying different virtual keypads that allow for input of data. (See, e.g., CX-23 at 27; CX-160 at 36-37; CX-1407.3C at Q/A 41, 44; Aybes, Tr. at 1021:1-21.) For example, the accused iPhone products are able to display the following different keypads:

---

6 HTC, in its initial post-hearing brief, only addressed the [ ] and thus, appeared to be abandoning its allegations of literal infringement with respect to the [ ] keypads. (CIB at 91-92.) In its post-hearing reply brief, however, HTC does address literal infringement by the [ ] keypads, albeit in a very cursory manner. (See CRB at 42.)
Of those various keyboards, only two are “keypad(s)” as that term has been construed by the undersigned.\(^7\) (See, e.g., CDX-3211 [ ] CDX-3307 [ ] CX-1407.3C at Q/A 44 [ ] numeric); CX-23 at 27.) Specifically, only the [ ] and the[ ] keypad have “keys arranged in a manner similar to the numbers on a standard pushbutton telephone.”

\(^7\) The [ ] keypad fails to satisfy the requirement that the keys be “arranged in a manner similar to the numbers on a standard pushbutton telephone” because it only features letters arranged in a QWERTY full-keyboard manner. (RX-808C at Q/A 54; Wobbrock, Tr. at 818:14-820:1, 823:14-23, 831:1-4; \textit{see also} JX-3 at 2:34-36 (distinguishing the claimed keyboard from a traditional QWERTY keyboard).
(CX-1407.3C at Q/A 44.) These keypads, however, are only capable of entering numbers. (See, e.g., CX-23 at 27 (stating that the phone and numerical keyboards offer different layouts that are tailored towards numerical input); RX-808C at Q/A 33-34, 69-75; Wobbrock, Tr. at 824:20-825:18, 884:23-885:10; Aybes, Tr. at 1021:4-25, 1025:2-24; Nieh, Tr. at 1176:3-23, 1177:6-15

The crux of the dispute, therefore, is whether a keypad that can only be used to enter a telephone number satisfies the limitation of a “kepad to generate a sequence of indicia corresponding to a telephone number.” (JX-3 at 9:3-4 (emphasis added)).

HTC argues while the scope of the Dialer Patents includes keypads that can enter names and phone numbers, such a keypad is not required. (CIB at 96; CRB at 36 (“Simply, the Dialer Patents require the claimed keypad to enter telephone numbers. Entry of letters is not required.” (emphasis original)).) In HTC’s view, the claimed “sequences of indicia” generated by the keypad must include at least sequences of indicia representative of phone numbers. (Id.) HTC insists that because a telephone number can be represented by multiple sequences of indicia, it is
“neither redundant nor nonsensical for the Dialer Patents to require entry of sequences of indicia.” (CIB at 96.)

Staff and Apple, on the other hand, argue that the phrase must be interpreted to mean a keypad that enters both letters and numbers such as ITC and 202-205-2000, where ITC would constitute the “sequence of indicia.” (SIB at 108-109; RIB at 123-125.)

The undersigned finds Staff’s and Apple’s arguments persuasive. The key language here is “corresponding to a telephone number.” This language requires some indicia that corresponds to a telephone number, and as both Apple and Staff correctly noted, a telephone number cannot correspond to itself. (RX-808C at Q/A 34 (“In other words, the ‘sequence of indicia corresponding to a telephone number’ is not a ‘telephone number.’”)). The claimed keypad must thus be capable of entering alphabetic characters, as well as numbers. (Id. (testifying that a person of ordinary skill in the art would understand the claims to require some sequence of indicia beyond a telephone number); see also Nieh, Tr. at 1180:5-18.) The specification supports this conclusion for it explains that the claimed “keypad” is used for entering “both letters for the name and digits for the number into a telephone directory’s memory.” (JX-3 at Abstract; see also 2:12-14, 2:38-39.) In addition, as other claims of the ’957 patent demonstrate, when the patentee intended a claim term to mean “a telephone number,” the claim recites a “telephone number” and not the phrase “a sequence of indicia corresponding to a telephone number.” (JX-4 at 9:35 (“A method of dialing a telephone number”), 9:58-60 (“selecting one telephone number having corresponding indicia displayed on said display device

---

8 HTC’s interpretation effectively removes this phrase from the claim. In so doing, HTC violates a basic tenet of claim construction, which is that all claim terms are presumed to having meaning. See Becton, Dickinson & Co. v. Tyco Healthcare Group, LP, 616 F.3d 1249, 1257 (Fed. Cir. 2007) (“Claims must be interpreted with an eye toward giving effect to all terms in the claim”); Elekta Instrument S.A. v. O.U.R. Scientific Int’l, Inc., 214 F.3d 1302, 1305-1307 (Fed. Cir. 2000) (refusing to adopt a claim construction which would render claim language meaningless).
and automatically dialing said number.

Thus, in the undersigned’s view, how the inventor chose to claim his invention clearly indicates that the claimed “keypad” is one that can enter letters and numbers.

Because neither the [ ] keypad nor the [ ] keypad is capable of entering alphabetic characters, HTC has failed to show, by a preponderance of the evidence, that Apple’s accused products satisfy the “a keypad to generate a sequence of indicia corresponding to a telephone number” limitation of claim 1 of the ’988 patent and claim 8 of the ’957 patent.

ii) “a manually operable scanning device to scan indicia on said selected page on said display/a manually operable scanning control device to control the scanning of indicia of said selected page on said electronic display device”

Claim 1 of the ’988 patent recites a “manually operable scanning device,” while claim 8 of the ’957 patent recites a “manually operable scanning control device.” (JX-3 at 9:15-16; JX-4 at 10:21-23.) The undersigned has construed “manually operable scanning device” as “a sliding or rotary-type control used to choose information on a particular page,” and the corresponding limitation in the ’957 patent as “a sliding or rotary-type control used to look through information in a chosen page.” (Order No. 29 at 90-91.)

HTC asserts that through the combination of the touchscreen, touch processor, and associated iOS software, the accused products provide a sliding or sliding-type control that enables a user to look through and select information on a particular page. (CIB at 102-103.) HTC claims that there is no dispute that [1] the accused products [ ] [2] the [ ] [3] [ ]
HTC insists that “[i]n this way, the [4] (Id.) HTC contends that nothing in the claim construction requires that the manually operable scanning device move and thus, in HTC’s view, “[a] control that can detect sliding or rotating, and that updates the display accordingly, satisfies the claims.” (Id.; see also CRB at 37-38.) To the extent that the asserted claims require a “control with a sliding or rotating sub-component,” HTC asserts that the [5] required by the claims. (Id. at 105; CRB at 38-39.)

Apple disputes HTC’s infringement allegations, arguing that the accused products do not practice these limitations for one simple reason – none of the accused products employ any sliding or rotary-type controls. (RIB at 111; RRB at 33-35) Apple criticizes Dr. Wobbrock’s moving capacitive well theory as nothing more than “fiction” for [4] (RIB at 112; RRB at 34-35.) Apple asserts that Dr. Wobbrock’s position substitutes the sliding of a finger across the touchscreen for a component that slides. In doing so, Dr. Wobbrock (and HTC), Apple argues, have improperly changed the meaning of the undersigned’s claim construction from a “sliding-type control” to “control by sliding.” (RIB at 112.)
Staff concurs with Apple, arguing that the [ ] does not satisfy the claim limitation of a physical part that is a “sliding or rotary-type control.” (SIB at 112; SRB at 26-28.) In Staff’s view, Apple’s [ ] eliminates the need for any manually operable controls and, for this reason, the accused products do not have the claimed “manually operable scanning device.” (SRB at 26.) Staff further submits that, contrary to HTC’s assertions, no physical component of the touchscreens moves or operates as a “sliding-type control.” (Id. (arguing that there is no evidence that the [ ] SRB at 28.) Like Apple, Staff also believes that HTC is attempting to reinterpret the Court’s claim construction of “sliding control” to mean “control by sliding,” which would, Staff submits, be a “near complete revision to the claim construction set forth in Order No. 29.” (SIB at 113.)

The undersigned agrees with Apple and Staff, finding the evidence shows that the accused products do not employ any sliding or rotary-type controls⁹ that would allow a user to choose information on a page. (RX-808C at Q/A 95, 97-99.) Nevertheless, Dr. Wobbrock, HTC’s expert, claims that the capacitive touch screen is the “manually operable scanning device.” (CX-1407.3C at Q/A 145 (“These scanning devices are a combination of hardware and software. This is a capacitive touch screen. When a user slides a finger across the touch screen, it moves a capacitance well. As the capacitance well slides, the displayed indicia move accordingly. Scanning causes new entries to appear on the display. The user can scan up and down, quickly or slowly. This is a sliding-type control.”).) The undersigned finds Dr. Wobbrock’s argument unpersuasive for the touchscreen is neither moveable nor does it deflect.

In fact, the evidence shows that the touchscreen structure of, at least, the accused iPhone

---

⁹ HTC does not contend that the accused products include a rotary-type control device. HTC’s allegations are limited to a slider-type control. (Wobbrock, Tr. at 772:12-15 (conceding that there are no rotary-type controls present in the accused products).)
products is [RX-319C at 13; RX-808C at Q/A 32, 94-105, 107, 114; RX-803C at Q/A 12, 29-31; Wobbrock, Tr. at 779:2-5 [797:16-20 ([], 828:4-11 (“Q. ], Parivar, Tr. at 1041:10-14, 1046:12-22 [Nieh, Tr. at 1161:3-1162:1 [RX-319 at 12-13, 21, 66, 78, Figs. 2 & 11 (demonstrating that [}
Despite the fact that there are no moving parts in the capacitive touchscreen, Dr. Wobbrock nonetheless asserted during his testimony that the "capacitive well" is dragged or slid around the touchscreen by the user’s finger. (CX-1407.3C at Q/A 755.) This, HTC contends, is the moving/sliding physical aspect of the accused products and as such, the accused products do provide a sliding-type control. (CRB at 38; see also CX-1407.3C at Q/A 756.) The undersigned disagrees and finds that the evidence demonstrates that this is indeed not the case. The Apple capacitive touchscreens [RX-808C at Q/A 100 (Wobbrock, Tr. at 744:20-758:13-22, 766:16-767:20.)] In other words, [Wobbrock, Tr. at 875:17-25.) There is no evidence that the [Wobbrock, Tr. at 756:20-24 ("Q. [Wobbrock, Tr. at 837:11-17; RX-808C at Q/A 100.)]

Moreover, Dr. Wobbrock has not formed an opinion nor does he know whether the [Wobbrock, Tr. at 744:20-745:10, 747:20-748:7, 756:3-19, 766:16-767:20, 837:11-17).]
In sum, the touchscreen does not move nor do the capacitors move. Thus, the only thing that moves or slides is the user's finger, which even HTC concedes cannot be part of the claimed apparatus. (See 10/25/10 Markman Tr. at 187:13-20.)

Furthermore, under HTC's position, the "sliding control" would be reinterpreted to mean "control by sliding." (See CIB at 104.) As both Apple and Staff correctly noted, by interpreting "sliding control" to mean "control by sliding," HTC has incorrectly changed the meaning of the undersigned's claim construction from a noun (i.e., a sliding-type of control that is part of the telephone dialer) to a verb (i.e., control by sliding a finger). Contrary to HTC's assertion, Order No. 29 does require the claimed "manually operable scanning device" to be a sliding part of a telephone dialer or, in other words, physically moveable by the user. (JX-3 at 2:1-10, 5:16-21, 5:34-36, 7:24-28, Fig. 8; see also Order No. 29 at 78-79, 89-90.) The specification confirms that the claimed "manually operable scanning device" must "move," stating:

The system functions as follows: the address generator 1, which could have different embodiments explained later, but in all cases is controlled by a single sliding or rotary type control, generates depending on the position of the control, an address or part of an address (could be simply the sequential order of a cell from a telephone directory), which is stored in the buffer 2; . . .

(JX-3 at 5:15-22; see also JX-4 at 5:14-16.)

The telephone dialler according to the invention provides an easy and fast access to the stored telephone directory through repositioning of a single sliding or rotary control, which depending upon its position causes the associated address generator to generate an address, used to retrieve the necessary telephone number and associated with it additional information.

(Id. at 2:1-7.)
The evidence demonstrates that Apple’s capacitive touchscreen [ ]

808C at Q/A 32, 100-101, 107, 114-15; RX-319C at 12-13, 21, 66, 78, Figs. 2 & 11; Wobbrock, Tr. at 736:12-746:18, 747:6-750:2, 753:13-25, 756:3-12, 756:20-757:20, 764:22-765:24, 766:14-767:24, 778:12-21, 779:22-25, 781:14-782:4, 797:16-20, 828:4-7, 837:11-19; 895:15-896:5; RX-803C at Q/A 29-31; Nieh, Tr. at 1161:3-1162:1, 1198:10-1199:13; Parivar, Tr. at 1041:10-14, 1046:12-22.) Because the accused products lack a physical moveable “sliding-type control,” they do not infringe the Dialer Patents. Accordingly, the undersigned finds that HTC has failed to show by the preponderance of the evidence that the “manually operable scanning device” limitation of claim of the ‘988 patent or the “manually operable scanning control device” limitation of claim 8 of the ‘957 patent is literally met by the accused products.

iii) “a manually operable selector to select one of said indicia on said display for dialling”

Claim 1 of the ’988 patent and claim 8 of the ’957 patent each recite a “manually operable selector.” (JX-3 at 9:16-18; JX-4 at 10:29-30.) The undersigned construed this term to be “a part moveable by hand used [to select]” – with the bracketed “to select” referring to the balance of the claim limitation, namely “to select one of said indicia on said display for dialling.” (Order No. 29 at 103.)

HTC argues that the accused products each provide a “manually operable selector” in a “number of contexts.” (CIB at 107 (arguing that on the iPhone, “a user may manually select: (1) directory entries on the Contacts page or from a user create group (such as “Coworkers” or “Family”); (2) phone numbers on a “contact card”; (3) directory entries within the Favorites and Recents pages; (4) the “white chevron” object located to the right of the directory entries on the
Favorites and Recents pages; or (5) the “Call Back” button displayed when an entry on the Voicemail page is selected,” and on the iPad or iPod Touch, “a user may manually select: (1) directory entries on the Contacts page; (2) phone numbers on any “contact card”; and (3) directory entries on the Quickdial, Favorites, History, or Call Log pages.”).) This is, HTC claims, implemented through [

] (CIB at 106; CRB at 39-40.) HTC contends that the accused products [

] (CIB at 107.) HTC insists that the selectors

on the accused devices [

Apple asserts that because there are no moveable parts, there is no infringement. (RIB at 116-118; RRB at 37.) In particular, Apple disputes HTC’s contention that this limitation is satisfied by the display of certain images on the LCD screen of the touchscreen. (RIB at 116.) Apple argues that this process [

] (RIB at 117 (citing RX-808C at Q/A 115-16, 120; Wobbrock, Tr. at 817:13-20).) Apple asserts that [

] (RIB at 117.)

Staff agrees with Apple that the accused products do not have the claimed “manually operable selector.” (SIB at 116-117; SRB at 29-31.) Staff asserts that the only part of the
acquainted devices used to accomplish the dialing is [ ] which in Staff's view, eliminates any need for the “part moveable by hand” to dial a telephone number, a required element of claim 1 of the '988 patent and claim 8 of the '957 patent. (SIB at 116; SRB at 30-31.) Staff therefore submits that there is no “[part moveable by hand used] to select one of said indicia on said display for dialing” because there is no “part” moveable by hand on the capacitive touchscreen of the accused products. (SIB at 116.)

HTC has identified the capacitive touchscreen as being a “part moveable by hand.” (See CX-1407.3C at Q/A 764.) However, as the undersigned discussed supra, the touchscreen on the accused products is not moveable. (See Section V.B.1.a.ii; see also RX-808C at Q/A 114, 116-117; RX-319C.) Because there is no “part” moveable by hand, there can be no “part moveable by hand used to select one of said indicia on said display for dialing.” (RX-808C at Q/A 113.) HTC contends that this limitation is satisfied by [ ] As Mr. Aybes testified, [ ] (RX-801C at Q/A 16 ([ ] It is therefore the undersigned’s opinion that [ ] do not meet the “part moveable by hand” requirement. (RX-808C at Q/A 120-121.) The undersigned similarly finds that user interface elements such as virtual buttons also fail to satisfy the claim requirement of being “a part moveable by hand” for a virtual button is nothing more than an
image, and an image displayed on the capacitive touchscreen is not a part moveable by hand.

(RX-808C at Q/A 122-123.) Because this limitation is not met by the accused products, HTC has failed to prove by a preponderance of the evidence that Apple's accused products literally infringe claim 1 of the '988 patent or claim 8 of the '957 patent.

b) Infringement under the Doctrine of Equivalents

i) “a keypad to generate a sequence of indicia corresponding to a telephone number”

HTC asserts that to the extent any claim element is not literally infringed, the accused products nevertheless infringe under the doctrine of equivalents. (CIB at 96-98; CRB at 42.) HTC claims that any differences between the claimed “keypad” and the [Keypad on the Accused Products are insubstantial, arguing that both [ ] (CIB at 96-97; CX-1407.3 at Q/A 857-58, 1067-68.) HTC also asserts that even if the undersigned determines the claimed “keypad” must be capable of entering names as sequences of indicia, the [ keypads of the accused products satisfy this element under the Doctrine of Equivalents. (CIB at 97-98; CX-1407.3C at Q/A 855-870.) The accused products, HTC argues, [ ] (CRB at 42.) According to HTC, “it is an insubstantial difference that the [ ] (CIB at 98 (citing CX-1407.3C at
Neither Apple nor Staff believes the evidence supports HTC’s contention that the Apple products practice this element under the doctrine of equivalents. (SIB at 111; RIB at 126-128.) Apple asserts that there are substantial differences between the use of [ ] and the way that the claimed invention (i.e., a permanent physical “data input device” with “keys”) operate. (RIB at 126.) Apple argues that the asserted claims require that the “sequence of indicia” correspond to a telephone number, [ ] Apple also argues that the [ ] keypad is not equivalent to the claimed “keypad” because “rather than being something that is insubstantially different than what is claimed, is something that was distinguished by the Dialer Patents.” (Id. at 127.) Apple contends that even if the [ ] could work in combination with the [ ] [ ] to enter both letters and numbers, “toggling back and forth between two different screens, results in something that is even less like, not more like, the ‘arrange[ment] of the keys] in a manner similar to the numbers on a standard pushbutton telephone.’” (RIB at 127; RRB at 42.)

For the most part, Staff’s arguments correspond with those of Apple, namely that because the [ ] “they do not have a critical function of the claimed ‘keypad’ of the Dialer Patents” and also that [ ] do not “perform the desired function in substantially the same way as the ‘claimed’ keypad” for they are similar in layout to a full-QWERTY keyboard and thus, are not “arranged in a manner similar to the numbers on a standard pushbutton telephone.” (SIB at 111; SRB at 26 (stating: “it implements the very keyboard complexity over which the inventor
distinguished the ‘keypad’ of his claimed invention.”).

As discussed *supra*, the evidence adduced at the evidentiary hearing confirms that the claimed “keypad” must be able to enter both letters and numbers. *(See Section V.B.1.a.i.)* The [ ] however, can only enter numbers and therefore fail to perform the function ascribed to the claimed “keypad.” *(See RX-808C at Q/A 40, 50.)* These keypads also perform their function in a substantially different way from the claimed invention. For example, the claimed invention operates through the depressing of keys or buttons. *(See, e.g., JX-3 at 2:27-37.)* The touchscreen in the accused products, on the other hand, works by [ ] *(RX-808C at Q/A 41, 51.)*

Because neither the [ ] keypad functions in substantially the same way, they do not infringe under the doctrine of equivalents. *See* *Wavetronix LLC v. Integrated Sys.*, 573 F.3d 1343, 1360 (Fed. Cir. 2009) (“A plaintiff can prove equivalence by showing on a limitation-by-limitation basis that the accused product performs substantially the same function in substantially the same way with substantially the same result as each claim limitation of the patented product.”).

As for the [ ] keypads, the undersigned notes, as an initial matter, that this alleged “equivalent” is a series of five different keypads.

(CDX-3212C; CDX-3306-CDX-3311; *see also* CX-1407.3C at Q/A 44-49, 964-65, 969-71.)
This alone appears to preclude a finding of infringement under the doctrine of equivalence for the difference between five keypads, regardless of whether they are working in conjunction with one another, with that of the claimed invention is far from insubstantial. See Wavetronix, 573 F.3d at 1360 ("An element in the accused product is equivalent to a claim limitation if the differences between the two are 'insubstantial' to one of ordinary skill in the art.") Of the five keypads, [

That keypad, however, is arranged like a traditional QWERTY keyboard, which is not only unlike the arrangement of a standard pushbutton telephone, but was expressly distinguished by the inventor. (RX-808C at Q/A 59; Order No. 29 at 61-62.) HTC’s doctrine of equivalents analysis therefore fails because it “expands to encompass subject matter that was surrendered from the claimed dialler by differentiating the claimed keypad both in the specifications of the Dialer Patents and their prosecution histories.” (RX-808C at Q/A 59; see also JX-3 at 2:34-36.) As such, the [ ] keypads do not perform substantially the same function in substantially the same way to achieve substantially the same result and thus, do not infringe under the doctrine of equivalents.

ii) “a manually operable scanning device to scan indicia on said selected page on said display/a manually operable scanning control device to control the scanning of indicia [sic] of said selected page on said electronic display device”

HTC asserts that at a minimum, the accused products provide the equivalent of the claimed sliding or sliding-type controls. (CIB at 105-106; CRB at 42-43.) HTC argues that on both the claimed invention and the accused products, the sliding or sliding-type controls perform substantially the same function (i.e., enabling a user to look through and choose information on a page of contacts by updating the page entries that are viewable on the display) in substantially the same way (i.e., by providing a mechanism that responds to a sliding action from the user) to
provide substantially the same result (i.e., updating information on the device’s display corresponding to the direction, speed, and extent of the movement of the user’s sliding input). (CIB at 105.)

Neither Apple nor Staff believes this claim limitation is satisfied under the Doctrine of Equivalents. (RIB at 112-113; SIB at 115.) Apple contends that its [ ] is very different from the electro-mechanical sliding and rotary controls described and claimed in the Dialer Patents, and the ‘ways’ in which the two technologies are implemented share nothing in common, and certainly are not implemented in ‘substantially the same way.’” (RRB at 35.) Staff, similarly, argues that [ ] functions in a substantially different way than the claimed ‘manually operable scanning device.’” (SIB at 115; see also SRB at 28-29.)

The undersigned finds HTC’s arguments unconvincing. While HTC may argue that “any differences are insubstantial,” the evidence adduced at trial demonstrates that the operation of the touchscreen is very different from the sliding and rotary controls of the claimed invention. (RX-808C at Q/A 107-112.) As Dr. Nieh testified, the accused products are [ ] (Id.) In the claimed invention, information or entries are looked up or “scanned” using a sliding or rotary-type control. In the accused products, however, [ ] not an electro-mechanical control, allows users to scroll through information on a page.12 (Id. at Q/A 115.)

---

11 In fact, Staff is of the view that the capacitive touch screen eliminated the need for the electro-mechanical sliding or rotary-type control. (SIB at 115.) The undersigned agrees.

12 Even HTC’s own expert, Dr. Wobbrock, recognizes that touchscreens offer several advantages over electro-mechanical controls. (RX-499 at Introduction (noting that “[t]ouch screen interfaces offer users several advantages over interfaces with physical buttons,” such as the ability to display different interfaces on the same screen, the “discoverability” of touchscreen interfaces, and the ability to support different interaction techniques).)

- 36 -
Moreover, this is implemented through the use of [ ], which is substantially different from the electro-mechanical controls described in the claimed invention. (RX-808C at Q/A 109-110; Wobbrock, Tr. at 738:12-748:9; RX-319C.)

In the undersigned’s view, one of ordinary skill in the art would find significant differences to exist between the accused products and the claimed “manually operable scanning device.” HTC has therefore failed to carry its burden to prove that the accused products perform substantially the same function in substantially the same way with substantially the same result as the claim limitation. See Wavetronix, 573 F.3d at 1360 ("[A]n element in an accused product is equivalent to a claim limitation if the differences between the two are ‘insubstantial’ to one of ordinary skill in the art.”).

iii) “a manually operable selector to select one of said indicia on said display for dialling”

HTC asserts that even if the “manually operable selector” element required displacement of the selector, the accused products would nonetheless satisfy the requirement under the Doctrine of Equivalents. (CIB at 109; CRB at 43-44.) In support thereof, HTC argues that the identified selectors on the accused devices are the equivalent of electro-mechanical push buttons. (CIB at 109.) HTC claims that they enable a user to select a telephone entry for dialing by [ ] (Id.)

Apple contends that HTC has not shown by a preponderance of the evidence that the accused products practice the claimed “manually operable selector” under the doctrine of equivalents. (RIB at 118; RRB at 38.) Staff concurs. (SIB at 116-117; SRB at 31.) Both Apple
and Staff argue that the [ ] of the accused products is not only substantially different from the claimed “manually operable selector,” which is a part moveable by hand, but they “share nothing in common.” (RIB at 118; SIB at 117.) Apple also insists that “a part moveable by hand [ ] cannot be the equivalent of a part that must be moveable by hand.” (RIB at 118; RRB at 38.)

The undersigned finds Apple’s and Staff’s arguments persuasive and agrees that the “manually operable selector” limitation is not met under the doctrine of equivalents due to the significant differences that exist between the [ ] within the accused devices and a part that is moveable by hand. (RX-808C at Q/A 124-129.) Temporary data or images are not equivalent to a physical part of a device that is moveable by hand. (RX-808C at Q/A 124 [ ] 126 [ ]

Nor is transitioning from screen to screen (depicted below) or the highlighting of a call equivalent to the movement required by the claim for it is not related to the dialing function in the accused products. (RX-808C at Q/A 121; Wobbrock, Tr. at 815:16-817:8; see also JX-3 at 2:9-10, 5:38-42 (describing that depression of the manually operable selector initiates call).)
A person of ordinary skill in the art would therefore find Apple’s [dissimilar to “a part moveable hand.” (See RX-808C at Q/A 124 [ ] resembling ‘substantially the same way.’ Indeed, the two share nothing in common and are so dissimilar that a person of ordinary skill in the art would not normally even consider them for [ ] 126 [ ]

For the reasons set forth above, the undersigned finds that HTC has failed to prove by a preponderance of the evidence that the accused products infringe under the doctrine of equivalents.

c) Induced Infringement

The undersigned has found hereinabove that the accused products do not directly infringe either claim 1 of the ’988 patent or claim 9 of the ’957 patent. HTC, therefore, cannot prove that Apple induces infringement of either of these claims. See i4i Ltd. P’ship, 598 F.3d at 851 (“To prove inducement, the patentee must show direct infringement.”); Cross Med. Prods., Inc. v. Medtronic Sofamor Danek, Inc., 424 F.3d 1293, 1312 (Fed. Cir. 2005) (“In order to succeed on a claim of inducement, the patentee must show, first that there has been direct infringement,’ and ‘second, that the alleged infringer knowingly induced infringement and possessed specific intent to encourage another’s infringement.’”)

2. Dependent Claims

a) Claim 10 of the ’988 Patent

Claim 10 depends from independent claim 1 of the ’988 patent. Because the undersigned has found hereinabove that the accused products do not infringe independent claim 1, dependent
claims 10 is also not infringed. *Muniauction, Inc. v. Thomson Corp.*, 532 F.3d 1318, 1328-29 n.5 (Fed. Cir. 2008) ("A conclusion of noninfringement as to the independent claims requires a conclusion of noninfringement as to the dependent claims."); *Monsanto Co. v. Syngenta Seeds, Inc.*, 503 F.3d 1352, 1359 (Fed. Cir. 2007) ("One who does not infringe an independent claim cannot infringe a claim dependent on (and thus containing all the limitations of) that claim."); *Wahpeton Canvas Co. v. Frontier, Inc.*, 870 F.2d 1546, 1553 (Fed. Cir. 1989) ("It is axiomatic that dependent claims cannot be found infringed unless the claims from which they depend have been found to have been infringed.")

b) **Claim 9 of the ’957 Patent**

Claim 9 depends from independent claim 8 of the ’957 patent. Because the undersigned has found hereinabove that the accused products do not infringe independent claim 8, dependent claim 9 is also not infringed. *Monsanto Co. v. Syngenta Seeds, Inc.*, 503 F.3d 1352, 1359 (Fed. Cir. 2007) ("One who does not infringe an independent claim cannot infringe a claim dependent on (and thus containing all the limitations of) that claim."); *Wahpeton Canvas Co. v. Frontier, Inc.*, 870 F.2d 1546, 1553 (Fed. Cir. 1989) ("It is axiomatic that dependent claims cannot be found infringed unless the claims from which they depend have been found to have been infringed.")

C. **Validity**

1. **Priority Date**

A threshold issue that must first be addressed is whether the Dialer Patents should be afforded a priority date of June 27, 1994, as Apple alleges, or are entitled to a priority date at least as early as May 6, 1992, as HTC contends. (See RIB at 140-142; CIB at 123-127.) June 27, 1994 is the filing date of the application for the ’988 patent. (JX-3 at 1.) May 6, 1992 is the
filing date of Application Serial No. 898,987 (the '987 application"), which issued as U.S. Patent No. 5,359,651. (JX-219.) The '987 application is the parent of the '988 patent and the grandparent of the '957 patent. (JX-3 at 1 ("Continuation-in-part of Ser. No. 878,987, May 6, 1992, Pat. No. 5,359,651."); JX-4 at 1 ("Continuation of application No. 08/585,886, filed on Jan. 16, 1996, now abandoned, which is a continuation of application No. 08/265,951, filed on Jun. 27, 1994, now Pat. No. 5,541,988, which is a continuation-in-part of application No. 07/878,987, filed on May 6, 1992, now Pat. No. 5,359,651.").)

Apple asserts that HTC incorrectly claims priority to an earlier 1991 Canadian application and an earlier 1992 United States application, neither of which allegedly disclose the claimed “discrete pages” and “page selection device.” (RIB at 140; RRB at 44-45.) Apple challenges HTC’s expert’s identification of two excerpts from the prior applications that Dr. MacKenzie contends disclose the recited “discrete pages,” arguing that the first excerpt pertains to a prior art patent, not the invention and that the second excerpt is similarly deficient for it fails to discuss any form of page. (Id. at 140-141.) Apple also objects to Dr. MacKenzie’s contention that the claimed page selection device was disclosed in the earlier applications’ discussion of the use of alphanumeric keys. (Id. at 141 (arguing that “no single key described in this passage could select every discrete page separately as required by this claim limitation.”).)

In response, HTC argues that the asserted claims were disclosed as of May 6, 1992. HTC submits at least two portions of the '987 application disclose the “discrete pages” and “page selection device” limitations. (CIB at 124-126 ("The absence of the exact phrases “discrete pages” and “page selection device” is immaterial).) The first such disclosure, HTC asserts, is in the discussion relating to Canadian Patent No. 1,266,930 to Seto, where the word “page” is used approximately six times. (CIB at 124-125 (citing MacKenzie, Tr. at 1742:3-1743:23; JX-228;
The second disclosure, HTC contends, occurs on page 9, wherein a method for selecting pages, where each page contains all directory entries starting with the same letter is described. (Id. at 125-126 (arguing that, contrary to Apple’s assertion, claim 1 has no requirement that the same page selection device be used to select each page).) HTC claims that a person of ordinary skill would recognize this passage as describing and enabling “discrete pages” and a “page selection device.” (Id.) HTC further asserts that because an earlier Canadian application discloses the same information, the asserted claims are entitled to a priority date of May 8, 1991. (Id. at 124-125.)

In Staff’s view, the asserted claims are entitled to a priority date of May 8, 1991 or, in the alternative, a priority date no later than May 6, 1992. (SIB at 124; SRB at 32-33.) In support thereof, Staff argues that the Canadian application teaches pushing an alpha-numeric key, which generates a list of contacts from the telephone directory whose names begin with the selected alpha-numeric key that a user can scan or look through. (SIB at 125 (citing RX-480 at HTC721ITC10606444-46).) Because the device disclosed in the Canadian patent application is capable of causing the display of “separate” “collections of information from a telephone directory,” such as pages in which the names of the contacts are limited to a particular letter of the alphabet, Staff believes the concept of a page selection device and discrete pages is properly disclosed. (SIB at 124-125.)

The undersigned agrees with HTC and Staff that the Dialer Patents are entitled to a priority date no later than May 6, 1992. Contrary to Apple’s assertion, the evidence demonstrates that there is indeed sufficient disclosure in the ’987 application regarding the “page selection device” and “discrete pages” limitations to warrant a priority date of at least May 6,
A variation of the above described way – after depressing the appropriate control button the keypad 6 is switched into “name” mode, described in the next pages, but only for the first entered alpha-numeric character, and after that by activating the sliding/rotary control of the address generator 1 only those numbers from the telephone directory memory 5 are displayed on display 15 and moved to the buffer 4 for which the alpha-numeric supplementary data starts with the selected letter.

Here, the keypad (and, in particular, the alpha-numeric keys) correspond to the “page selection device,” which has been construed to mean a “push button . . . used to select a page.” (MacKenzie, Tr. at 1668:9-1670:17 (“Q. And in your opinion, for example, the number 1 key can select what you would call the discrete page for 1, the discrete page for Q, and the discrete page for Z. True? A. It is capable of being used as a page selection device to retrieve entries in the telephone directory, for example, all entries beginning with Q, yes.”); 1743:24-1746:19 (“Q. And what’s being disclosed here in terms of a page selection device, if anything? A. The page selection device is the keypad. Q. Okay. A. We have the keypad switched into a mode where keys represent letters. You type a letter, such as K, the discrete page of all entries beginning with K is retrieved from memory and output onto the display.”)). The undersigned further finds that a person of ordinary skill in the art would understand the foregoing passage as describing and enabling “discrete pages” for it discloses a

---

13 While the ‘987 application may specifically reference a “page selection device” or “discrete pages,” it need not use the exact phrase/terms to have sufficiently described and enabled said limitations. *Koito Mfg. Co., Ltd. v. Turn-Key-Tech, LLC*, 381 F.3d 1142, 1154 (Fed. Cir. 2004) (“Terms need not be used in haec verba.”); *Eiselstein v. Frank*, 52 F.3d 1035, 1038 (Fed. Cir. 1995) (“The prior application need not describe the claimed subject matter in exactly the same terms as used in the claims.”).

14 The undersigned has already determined that one of ordinary skill in the art would be an individual with a bachelor’s degree or higher in electrical engineering or its equivalent, with at least two years of experience in [1] automated or computer telephony, [2] computer architecture and software related to cellular phones, [3] home or office telephone systems, or [4] home or office automation systems. In addition, one of ordinary skill in the art shall be commensurate with the time of the respective inventions, i.e., the effective filing date for each of the patents-in-suit. (Order No. 29 at 6-7.)
device that is capable of displaying “a collection of information from a telephone directory”
(i.e., “those numbers from the telephone directory memory 5 . . . for which the alpha-numeric
supplementary data starts with the selected letter.”). (MacKenzie, Tr. at 1743:24-1746:19 (Q.
Can you please describe what is being disclosed here? A. Well, what we have here is discrete
pages in a mechanism for selecting. . . . And when the user specifies a letter from the keypad,
such as K, only those entries for which the alphanumeric supplementary data starts with the
selected letter, only those entries are output on to the display. So here we have the notion of
discrete pages.”).) Accordingly, the Dialer Patents are hereby deemed to have a priority date at
least as early as May 6, 1992.


As an initial matter, the evidence adduced at trial demonstrates that only two references
qualify as prior art – the Apple MacPhone (“MacPhone”) and the NorTel Meridian Telecenter
(“TeleCenter”). (RX-792.1C at Q/A 150, 156, 162-168, 172-174, 180-82; RX-793.1C at Q/A 8,
20-22, 30-99; RX-794.1 at Q/A 7-8, 11, 45-46; RX-565; RX-566; RDX-8.) Apple asserts the
IBM Simon, the Apple Newton, and the Motorola Envoy as additional anticipatory prior art
references. However, in view of the undersigned’s determination that the Dialer Patents are
entitled to a priority no later than May 6, 1992, these three references are eliminated as prior art
under 35 U.S.C. §102.15 (See RX-792.1C at Q/A 324-325 (Motorola Envoy), 425 (IBM Simon),
556 (Apple Newton).)

a) HTC’s “Telephone Dialer”16 Argument

HTC contends that neither the MacPhone nor the TeleCenter anticipate the asserted
claims because a “telephone dialer” must be an “integrated device capable of making and

---

15 Nor do these references qualify as prior art under 35 U.S.C. § 103.
16 While the parties refer to a “telephone dialer,” the claims recite a “telephone dialler” with two Ls. As explained
supra, the word “dialler” reflects the British spelling.
receiving phone calls.” (CIB at 131-135; CRB at 44-46; see also CX-1447.1C at Q/A 78-87.) For example, Dr. MacKenzie opined that one of ordinary skill in the art would have understood “a telephone dialer comprising” to refer to an integrated unit that makes and receives telephone calls without attaching any external components since the Dialer Patents disclaimed the prior art '929 patent on the ground that it required a separate alpha-numeric character keyboard. (CX-1447.1C at Q/A 78, 85, 86.) Dr. MacKenzie further opined that the specification of the '988 patent “clearly illustrate(s)” an integrated telephone dialer in Figure 1 without connections to any external devices. (Id. at Q/A 80.)

Both Apple and Staff dispute HTC’s contention, arguing that it is nothing more than a new claim construction argument. (SIB at 125-127; RIB at 104-106.) Neither Staff nor Apple believes there is any basis for importing HTC’s “integrated device” limitation into the asserted claims. (SIB at 126; RIB at 104-105.) Apple asserts that HTC previously sought to limit the claims to an integrated unit through its proposed construction of “keypad” to being “in a telephone” during the claim construction phase of this Investigation, which was rejected as being contrary to the claims. (RIB at 104.) HTC’s “integrated device” argument is therefore, Apple argues, in violation of “the rule against seeking constructions of newly identified claim terms after the claim construction process and is an untimely motion to reconsider Order No. 29.” (Id.) Apple claims that there is absolutely no support in the Dialer Patents for HTC’s argument that the telephone dialer is limited to a single-enclosure device with no external components. Apple also contends that the Dialer Patents distinguished the claimed dialer from the prior art '929 patent on the basis that it utilized a full keyboard rather than the claimed keypad, not because it described a system that is not an integrated device. (Id. at 105-106.)
Staff proffers arguments similar to those of Apple. In particular, Staff argues that adopting HTC’s construction of telephone dialer as an “integrated device” would “not only violate numerous, well-accepted canons of patent claim construction, but it conflicts with constructions adopted by the Judge in Order No. 29.” (SIB at 126.) Staff also submits that there is no support whatsoever in the intrinsic evidence for HTC’s “integrated device” limitation. (Id.)

The undersigned agrees with Apple and Staff. While not identical, HTC’s argument is very similar to or repetitive of the argument it made during the claim construction proceedings when it sought to limit the claimed keypad to being in a telephone. The undersigned rejected said argument, finding that:

None of the claims require that a telephone be used to practice said claims nor does the specification suggest that the claimed keypad is limited to a telephone embodiment. To the contrary, the specification makes quite clear that the invention is not limited to use “in a telephone,” stating: “The application of this telephone system is also very convenient for use in such office automation and home automation equipment as fax machines etc.” (‘988 patent at 3:35-37; see also Abstract (“The application is targeted for heavy traffic business or personal phones, family telephones, cellular phones and as a part of an office or home automation system.”).)

(Order No. 29 at 63.) The undersigned did not believe then nor does he now that the asserted claims are limited to an integrated device that can make and receive telephone calls. In fact, the specification repeatedly describes a “telephone system,” not a telephone or an integrated device. (See, e.g., JX-3 at 1:59-61, 3:35-37, 3:42-45, 3:61-62; 4:16-17, 4:66-5:2.) HTC’s “telephone dialer” argument also fails for two additional reasons. First, while the Dialer Patents did indeed distinguish the claimed invention from the ‘929 patent, it did so because it utilized a regular “alphanumeric character keyboard,” not because the keyboard was separate from the telephone. (RX-792.1C at Q/A 133, 134, 136; Order No. 29 at 61-63; JX-3 at 1:51-54, 2:34-36, 6:39-40.)
Second, Dr. MacKenzie read the term “comprising” as narrowing the claim. (See MacKenzie, Tr. at 1627:12-1629:7.) In so doing, Dr. MacKenzie violated a basic tenet of claim construction, which is that the term “comprising” is open-ended and thus, would not necessarily exclude separate/external components. See Manual of Patent Examining Procedure § 2111.03 (8th ed. 2010) (“The transitional term ‘comprising’, which is synonymous with ‘including,’ ‘containing,’ or ‘characterized by,’ is inclusive or open-ended and does not exclude additional, unrecited elements or method steps”); see also Mars, Inc. v. H.J. Heinz Co., L.P., 377 F.3d 1369, 1376 (Fed. Cir. 2004); Invitrogen Corp. v. Biocrest Mfg., L.P., 327 F.3d 1364, 1368 (Fed Cir. 2003) (“The transition ‘comprising’ in a method claim indicates that the claim is open-ended and allows for additional steps.”); Genentech, Inc. v. Chiron Corp., 112 F.3d 495, 501 (Fed Cir. 1997) (“‘Comprising’ is a term of art used in claim language which means that the named elements are essential, but other elements may be added and still form a construct within the scope of the claim.”). Accordingly, HTC’s “telephone dialer” argument fails and said term shall be accorded its plain meaning, which is a “system that dials telephone numbers.” (See RX-792.1C at Q/A 363, 573.)

b) Apple MacPhone and the NorTel Meridian TeleCenter

Apple insists that these two systems disclose each and every limitation of the asserted claims and thus, invalidate the Dialer Patents. (RIB at 135-139; RRB at 47-48.) In support thereof, Apple asserts that both the MacPhone and the TeleCenter are “telephone dialers” used to dial telephone numbers, that they both include multiple keypads that disclose the claimed “keypad” (i.e., the Apple Extended Keyboard with a numeric keypad and the handset keypads that can be used to enter a telephone number), and that they both include a rotary-type control
(i.e., a mouse). *(Id.*) Apple also claims that these systems disclose every other limitation of the asserted claims. *(RIB at 139; RRB at 48.)*

HTC argues that the MacPhone and TeleCenter do not anticipate the asserted claims because they fail to disclose each and every limitation, namely the claimed “keypad” and “manually operable scanning device to scan indicia of said selected page on said display” and the “whenever” limitation of claim 10 of the ’988 patent. *(CIB at 135-137; CRB at 46-47.)* In particular, HTC contends that neither the keypad on the external telephone handset nor the numeric keypad of the external keyboard is the claimed “keypad.” The keypad on the external telephone handset, HTC asserts, can only generate indicia stored in a single page and thus, lacks “discrete pages,” while the numeric keypad of the external keyboard is not “arranged in the manner of the numbers on a standard pushbutton telephone.” *(CIB at 135; CRB at 46-47.)* As for the “manually operable scanning device/manually operable scanning control device,” HTC argues that neither the MacPhone nor the TeleCenter contains a feature that uses a sliding or rotating control to “look through” or “scan” the entries in a page. *(CIB at 136; CRB at 47.)* Lastly, HTC maintains that the MacPhone and the TeleCenter cannot – as required by claim 10 of the ’988 patent – switch from the second mode to the first mode whenever any of the buttons of the numeric keypad are depressed for a user must first click “the manual dial box” in either system to switch from the second to the first mode. *(CIB at 137.)*

Staff concurs with HTC for, in its view, the evidence does not show that either the MacPhone or the TeleCenter disclose the claimed “keypad” element of claim 1. *(SIB at 128; SRB at 35-36.)*

---

17 HTC also argued that the MacPhone and the TeleCenter failed to disclose the “telephone dialler” limitation. *(CIB at 131-135; CRB at 44-46.)* HTC’s entire argument, however, was premised – wrongly so – upon a “telephone dialer” being an integrated device that can make and receive telephone calls, which was rejected by the undersigned in Section V.C.2.a, *supra.*

- 48 -
For a claim to be anticipated, each claim element must be disclosed, either expressly or inherently, in a single prior art reference, the claimed arrangement or combination of those elements must also be disclosed, either expressly or inherently, in that same prior art reference, and this must be proven by clear and convincing evidence. Minn. Mining & Mfg. Co. v. Johnson & Johnson Orthopaedics, Inc., 976 F.2d 1559, 1565 (Fed. Cir. 1992). Here, Apple seeks to invalidate the Dialer Patents under § 102(a) in a mere five pages (out of a 149 page brief).\(^{18}\) (RIB at 135-139.) While the specific number of pages dedicated to a party’s § 102(a) invalidity analysis is certainly not dispositive, it is indicative of how Apple has not met its burden of clear and convincing evidence. In fact, Apple’s entire argument with respect to the MacPhone and TeleCenter disclosing “every other limitation” of the asserted claims (excluding the “telephone dialer,” “keypad,” and “manually operable scanning device”) is set forth in a cursory fashion in one paragraph. (RIB at 139.) Rather than explain how the elements of these two systems actually anticipate the limitations of the claims of the Dialer Patent, Apple simply states that “The MacPhone and TeleCenter are prior art at least under subsections (a), (b) and (g) of section 102 and clearly and convincingly disclose the presence of each of the other claim limitations of the asserted claims.” (Ibd.) The undersigned finds that cursory assertions and conclusory arguments are insufficient for Apple to meet the clear and convincing standard necessary to invalidate the Dialer Patents.

In addition, the undersigned also finds that the MacPhone and the TeleCenter both fail to disclosed the claimed “keypad” element of claim 1. The undersigned has construed “keypad” as a “data input device in which the keys are arranged in a manner similar to the numbers on a standard pushbutton telephone.” (Order No. 29 at 65.) Both the MacPhone and the TeleCenter

\(^{18}\) At most, the extent of Apple’s argument is eight pages and this is only so if arguments devoted to references eliminated by the undersigned’s determination that the Dialer Patents are entitled to a priority date no later than May 6, 1992 are considered.
used a QWERTY keyboard with a numeric keypad. (RPX-13 – RPX-15; RPX-21; RDX-11; RDX-21.) The keys on a QWERTY-style keyboard, however, are not “arranged in a manner similar to the numbers on a standard pushbutton telephone.” (CX-1447.1C at Q/A 167.) Similarly, the keys on the numeric keypad, which are arranged in the style of a calculator, are not “arranged in a manner similar to the numbers on a standard pushbutton telephone.” (CX-1447.1C at Q/A 171, 255, 256; RPX-13; RPX-14; RPX-21; RPX-22.) For this reason, the MacPhone and TeleCenter systems lack the claimed “keypad” and as such, neither system anticipates the asserted claims of the Dialer Patents.


Apple also seeks to invalidate the Dialer Patents based on obviousness of the asserted claims. (RIB at 143-144.) To successfully do so, Apple must prove by clear and convincing evidence that the invention was obvious and thus should not have been patented. *PharmaStem Therapeutics*, 491 F.3d at 1360. Apple’s entire argument, however, is predicated upon two paragraphs of conclusory allegations. Merely stating that “the record is replete with other references that also demonstrate the lack of novelty of the purported invention” and that “[t]he features and functions of these publications were well known to those of ordinary skill in the art and implementing them in the combinations claimed by the Dialer Patents would have required no more than ordinary skill and provided predictable results” is not sufficient for Apple to meet the clear and convincing standard necessary to invalidate the Dialer Patents. (See RIB at 143-144.) Moreover, beyond a list of the prior art references, Apple provides no explanation whatsoever as to how these references would be combined to render the claims obvious or the motivation behind combining said references. *KSR Int’l Co. v. Teleflex Inc.*, 550 U.S. 398, 418 (2007) (requiring that there still needs to be a “reason to combine the known elements in the
fashion claimed by the patent at issue.”). The undersigned therefore finds that Apple has failed to show by clear and convincing evidence any of the asserted claims are obvious in light of any of the asserted prior art combinations.

D. Domestic Industry – Technical Prong

HTC asserts that the HTC Evo 4G, the HTC Incredible, the HTC Hero, the HTC Droid Eris, and the T-Mobile G1 (collectively, the “DI products”) each practice every element of claim 1 of the '988 patent and claim 8 of the '957 patent. [ 

Apple disputes HTC’s contention that its DI products satisfy the technical prong of the domestic industry requirement, arguing that none of the DI products include the claimed “keypad.” (RIB at 132-134.)

Staff submits that HTC satisfies the technical prong because the HTC Droid Eris and the HTC Hero practice each element of claim 1 of the '988 patent and claim 8 of the '957 patent. (SIB at 120-123; SRB at 31-32.)

The undersigned agrees with Staff, finding that the evidence shows that the HTC Droid Eris and the HTC Hero satisfy each element of claim 1 of the '988 patent and claim 8 of the '957 patent. (See, e.g., CX-1407.3C at 577, 581-82, 585-88, 622, 645, 674, 669-700, 1183, 1188-89, 1191, 1198, 1200-1201, 1243, 1245-46, 1250, 1252, 1255, 1316; CX-117; CX-109; JX-32.)
Thus, the central dispute between the parties is whether or not the DI products have the claimed "keypad." (CIB at 118-119; RIB at 132-134; SIB at 120-121.)

19 In its post-hearing briefing, Apple’s entire “no domestic industry” argument was predicated upon the claimed “keypad” and the lack of said keypad in the HTC DI products. (RIB at 132-134.) Apple failed to include any discussion whatsoever of whether or not the HTC DI products satisfy the other claim elements. As such, Apple has waived any and all argument with respect to the other claim limitations (e.g., “CPU,” “page selection device,” “manually operable selector,” “memory,” etc.). (See Ground Rule 11.1.)
Apple claims that the identified keypads do not satisfy the “keypad” limitation because they do not include keys, are not arranged in a manner similar to the numbers on a standard pushbutton telephone, or both. (RIB at 132-133.)
Since these keypads can enter a “sequence of indicia corresponding to a telephone number” and are arranged similar to a standard pushbutton telephone, they meet the “keypad” limitation.

Based on the foregoing, the undersigned finds that HTC has established by a preponderance of the evidence that at least the HTC Droid Eris and the HTC Hero practice claim 1 of the ’988 patent and claim 8 of the ’957 patent.\textsuperscript{22}

In conclusion, because the HTC Droid Eris and the HTC Hero practice claim 1 of the ’988 patent and claim 8 of the ’957 patent, HTC has satisfied the technical prong of 19 U.S.C. § 1337(a)(2) and (3.)

VI. THE ’800 PATENT

A. Overview

HTC alleges that Apple violates Section 337 through the importation, the sale for importation, and the sale within the United States after importation of the original iPhone, iPhone 3G, iPhone 3GS, iPhone 4, and CDMA iPhone (collectively, “the Accused iPhones”), that literally infringe asserted claims 1, 2, 4, 6, 10, 11, 14, and 15 of the ’800 patent.\textsuperscript{23}

1. Asserted Claims

Eight claims of the ’800 patent are asserted against Respondent, namely independent claim 1, along with dependent claims 2, 4, 6, 10, 11, 14, and 15. These claims read as follows:

1. A method for power management of a smart phone having a power system, a mobile phone system operated in a standby, sleep, connection or off mode, and a PDA system operated in a normal, sleep or off mode, the method comprising steps of: resetting the

\textsuperscript{21} The undersigned notes that the keys need only be arranged in a manner similar to a standard pushbutton telephone. The keys need not be arranged in an identical manner.

\textsuperscript{22} HTC need only show that it practices one claim of each of the Dialer Patents for it to satisfy the technical prong of the domestic industry requirement. See Certain Microsphere Adhesives, Comm’n Op. at 6.

\textsuperscript{23} Having failed to address claim 3 in its post-hearing briefs, HTC has accordingly waived its infringement allegations with respect to that claim.
smart phone; searching for network service for the mobile phone system; operating the mobile phone system in standby mode and the PDA system in normal mode when the network is located and connected to; switching the mobile phone system from standby mode to connection mode when establishing communication with a remote terminal of the network; switching the mobile phone system from standby mode to sleep mode when the mobile phone system has been idle for a first period of time; switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time; and implementing a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off mode when the detected amount is less than a second threshold.

2. The method as claimed in claim 1 further comprising the step of: switching the mobile phone system to sleep mode when the network fails to be either located or connected to.

4. The method as claimed in claim 1 further comprising the step of: switching the mobile system from connection mode to standby mode when the communication is terminated.

6. The method as claimed in claim 1, wherein the PDA system is switched from sleep mode to normal mode when being awoken.

10. The method as claimed in claim 1, wherein the power detection method is implemented every fourth period of time.

11. The method as claimed in claim 1, wherein the PDA system displays a warning message when the mobile phone system is switched to off mode due to the detected amount of power less than the first threshold.

14. The method as claimed in claim 1 further comprising steps of: charging the source in the power system; and switching the mobile phone system from off mode to standby mode when the amount of power of the source detected is larger than the first threshold.

15. The method as claimed in claim 1 further comprising steps of: charging the source in the power system; and switching the PDA system from off mode to normal mode when the amount of power of the source detected is larger than the second threshold.

(JX-1 at 6:31-62; 7:1-4, 7-9, 16-22; 8:7-18.)
2. **Claim Construction**

As noted above, the undersigned has already construed the above claims in a *Markman* order. (Order No. 29.) A summary of the claims construed in that order is detailed below:

<table>
<thead>
<tr>
<th>Claim</th>
<th>Term</th>
<th>Construction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Claim 1</td>
<td>smart phone</td>
<td>a device that includes a combination of a mobile phone subsystem and a PDA subsystem</td>
</tr>
<tr>
<td>Claim 1</td>
<td>mobile phone system</td>
<td>a smart phone subsystem that is used to make outgoing calls and to receive incoming calls</td>
</tr>
<tr>
<td>Claim 1</td>
<td>off mode</td>
<td>an operational mode in which the least amount of power is supplied to the subsystem compared to any other operational mode (e.g., normal, sleep, connection, or standby)</td>
</tr>
<tr>
<td>Claim 1</td>
<td>PDA system</td>
<td>a smart phone subsystem that accesses, stores, and organizes information</td>
</tr>
<tr>
<td>Claim 1</td>
<td>standby mode</td>
<td>an operational mode in which the network has been located and connected to but communication with a remote network has not been established</td>
</tr>
<tr>
<td>Claim 1</td>
<td>sleep mode</td>
<td>an operational mode in which the amount of power supplied to the subsystem is less than any mode except for off mode</td>
</tr>
<tr>
<td>Claim 1</td>
<td>idle</td>
<td>unused or not in use</td>
</tr>
<tr>
<td>Claim 1</td>
<td>switching the mobile phone system to off mode when the detected amount is less than a first threshold</td>
<td>switching the mobile phone system to off mode when the detected amount of power in the power source is less than a first value</td>
</tr>
<tr>
<td>Claim 1</td>
<td>switching the PDA system to off mode when the detected amount is less than a second threshold</td>
<td>switching the PDA system to off mode when the detected amount of power in the power source is less than a second value; provided however, that the values of the first and second thresholds may be the same or different, and must be separately set</td>
</tr>
<tr>
<td>Claim 3</td>
<td>searching for network service while the mobile phone system remains in sleep mode for a third period of time</td>
<td>searching for network service at the same time that the mobile phone system remains in sleep mode for a period of time</td>
</tr>
</tbody>
</table>
B. Infringement

1. Direct Infringement

a) Claim 1

HTC asserts that Apple and its customers use each of the Accused iPhones to practice the method of claim 1 of the '800 patent. According to HTC, Apple designs the Accused iPhones to infringe and actively induces its users, by providing instructional documentation such as user guides and programming guides, to practice every step of the asserted claims. HTC asserts that Apple does not dispute that many of the claimed steps are practiced by the Accused iPhones, but instead is creating disputes that attempt to redefine and re-litigate aspects of the claim construction, run contrary to established precedent, and contradict testimony from its own expert and engineers. (CIB at 5.)

Apple asserts that HTC failed to establish direct infringement because it failed to prove, on a limitation-by-limitation basis, that [ ] (RIB at 31.) In addition, Apple asserts that the testing [ ] (Id. at 31.)

In Staff’s view, the evidence shows that independent claim 1 of the '800 patent is not infringed by the Accused iPhones. (SIB at 34.) In particular, Staff contends that the Accused iPhones do not practice several elements of claim 1. (Id.)

For the reasons discussed below, the undersigned finds that HTC has failed to prove, by a preponderance of the evidence, that the Accused iPhones meet each and every limitation of claim 1 of the '800 patent.
i) "switching the PDA system from normal mode to sleep mode when the PDA system has been idle for a second period of time"

HTC asserts that the Accused iPhones satisfy this limitation of claim 1 because the [ ]

Staff agrees with Apple and contends that the [ ] as required by the claim construction. (SIB at 35.) Staff contends that the [ ]
The undersigned finds the arguments of Apple to be persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the Accused iPhones practice this limitation of claim 1. HTC claims that the Accused iPhones [CX-1405.2C at Q/A 247-254, 534-66, 957-89, 1381-1412, 1809-41, 2248-79; RX-807.1C at Q/A 233; Alpert, Tr. at 1450:12-16; see also JX-22 at 14.) HTC equates this [ ] to the claimed sleep mode.
The undersigned finds, however, that when [ ] as required by the claim construction. (Order No. 29 at 22.) Instead, the Accused iPhones [ ]

In contrast, all of the [ ] (Williams, Tr. at 440:21-441:3.) HTC’s expert even admits that the [CX-1405.2C at Q/A 159; Williams, Tr. at 441:24-442:2.) Thus, the [ ] does not meet the claim construction for the term sleep mode and the Accused iPhones do not [ ]
ii) “implementing a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off mode when the detected amount is less than a second threshold”

HTC asserts that the Accused iPhones practice this limitation of claim 1, in part because

operational mode. (Id. at 23-24 (citing RX-802C at Q/A 23, 25-28, 31-33; RX-807.1C at Q/A 261; Apple PHB at 31-34; Novick, Tr. at 1217:4-20).) HTC argues that after [ ]

In opposition, Apple asserts that the Accused iPhones [ ]

12.) Apple asserts that even if the [ ]
Thus, Apple asserts that the

[ ] (Id. at 15 (citing Williams, Tr. at 505:6-507:10, 508:10-25; Patel, Tr. at 376:22-377:5).)

Staff agrees with Apple and contends that the

[ ] as identified by HTC, [ ] Instead, Staff asserts that the

[ ] (SIB at 38-39 (citing RX-807.1C at Q/A 257, 261, 263, 286; RX-802C at Q/A 18, 19, 31-33).) Thus, Staff contends that for the

[ ] (Id. at 38.)

The undersigned finds that HTC has failed to prove, by a preponderance of the evidence, that the Accused iPhones practice this limitation of claim 1. The claim construction requires that the MPS be switched to off mode when “the detected amount of power in the power source is less than a first value” and the PDA system be switched to off mode when “the detected amount of power in the power source is less than a second value,” provided that “the values of the first and second thresholds may be the same or different, and must be separately set.” (Order No. 29 at 27.) Thus, while the first and second thresholds can be the same or different, the “detected amount” that is compared to the first threshold is the same as the “detected amount” that is compared to the second threshold. [ ] method at least two times – they first detect a critical low battery condition causing the MPS to switch to off mode, and then monitor the battery voltage to switch the PDA to off mode. (See RX-807.1C at Q/A 250, 275.) Thus, the Accused iPhones [ ]
In addition, the [ ] as required by the claim construction. [ ]

[ ] (Id.) Thus, the Accused iPhones do not “implement[] a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off mode when the detected amount is less than a second threshold,” as recited in claim 1.

In conclusion, the Accused iPhones do not practice all of the limitations of claim 1 and thus, do not infringe claim 1 of the ’800 patent.

b) Claims 2, 4, 6, 10, 11, 14, and 15

Claims 2, 4, 6, 10, 11, 14, and 15 depend from independent claim 1 of the ’800 patent. Because the undersigned has found hereinabove that the Accused iPhones do not infringe
independent claim 1, dependent claims 2, 4, 6, 10, 11, 14, and 15 are also not infringed. 

*Muniauction, Inc. v. Thomson Corp.*, 532 F.3d 1318, 1328-29 n.5 (Fed. Cir. 2008) ("A conclusion of noninfringement as to the independent claims requires a conclusion of noninfringement as to the dependent claims."); *Monsanto Co. v. Syngenta Seeds, Inc.*, 503 F.3d 1352, 1359 (Fed. Cir. 2007) ("One who does not infringe an independent claim cannot infringe a claim dependent on (and thus containing all the limitations of) that claim."); *Wahpeton Canvas Co. v. Frontier, Inc.*, 870 F.2d 1546, 1553 (Fed. Cir. 1989) ("It is axiomatic that dependent claims cannot be found infringed unless the claims from which they depend have been found to have been infringed.")

2. **Contributory and Induced Infringement**

The undersigned finds that because HTC has not proven direct infringement, it cannot prove indirect infringement. Accordingly, HTC has failed to show that Apple contributorily infringes or induces infringement of the asserted claims of the '800 patent. *See BMC Res.*, 498 F.3d at 1379 (direct infringement must first be established in order for a claim of indirect infringement to prevail); *see also i4i Ltd. P'ship*, 598 F.3d at 851 ("To prove inducement, the patentee must show direct infringement."); *Spansion*, 629 F.3d at 1353 (complainant alleging contributory infringement must show an act of direct infringement in violation of 337).

C. **Validity**

1. **Ordinary Skill in the Art**

As previously stated in Order No. 29, one of ordinary skill in the art would be an engineer with a bachelor’s degree or higher in electrical or computer engineering and one or more years of experience working with portable computing devices or portable communications devices, or both. (Order No. 29 at 6-7)
2. **Priority Date**

HTC contends that the priority date for the ’800 patent should be October 23, 2002. HTC claims that the ’800 patent claims the benefit of priority to the October 23, 2002 filing date of its corresponding Taiwanese application. HTC further claims that the Taiwanese application contains a full and enabling written description supporting all claimed subject matter. (CIB at 44 (citing CDX-8902C; CX-1448.2C at Q/A 901, 908-10; CFF at 5.4002-07).)

Staff agrees with HTC that the evidence supports a priority date for the ’800 patent of October 23, 2002. (SIB at 62 (citing JX-1; RX-209).) Staff contends that the evidence demonstrates that the corresponding Taiwanese application discloses each of the steps set forth in claims 1, 2, 4, 6, 10, 11, 14, and 15 of the ’800 patent. (Id. at 62 (citing RX-209 at PH0000042, PH0000052-54).)

The undersigned finds HTC’s arguments persuasive. The evidence shows that the ’800 patent claims priority to the corresponding Taiwanese application, which was filed on October 23, 2002. (JX-1; RX-209.) The evidence further shows that the Taiwanese application discloses each of the steps set forth in claims 1, 2, 4, 6, 10, 11, 14, and 15 of the ’800 patent. (RX-209 at PH0000038-66.) In reviewing the certified translation of the Taiwanese application, the undersigned finds that the specification of the Taiwanese application is very similar to the specification for the ’800 patent. The claims in the Taiwanese application are also very similar to those in the ’800 patent. Thus, the priority date for the ’800 patent should be October 23, 2002.

3. **Anticipation**

Apple asserts that each asserted claim of the ’800 patent is anticipated by several prior art references, including the HTC Wallaby Smartphone, the Qualcomm pdQ Smartphone, and the Kyocera 6035 Smartphone. (RIB at 46.)
HTC asserts that Apple relies on devices for purposes of invalidity without providing evidence that any of these devices was actually used to practice the asserted claims in the United States before the priority date of the ‘800 patent. (CIB at 44.) HTC further asserts that Apple fails to establish that any of the prior art anticipates the asserted claims. (Id. at 45.)

Staff agrees with HTC and does not find that the prior art identified by Apple anticipates each element of independent claim 1. (SIB at 61.)

For the reasons discussed below, the undersigned finds that Apple has failed to prove, by clear and convincing evidence, that the prior art anticipates the asserted claims of the ‘800 patent.

a) HTC Wallaby Smartphone

Apple asserts that the HTC Wallaby Smartphone was sold or offered for sale in the United States [ ]

Staff contends that the earliest sale of an HTC Wallaby in the United States was around [ ]

[ ]
i) Claim 1
Thus, Staff asserts that Apple has not demonstrated that the HTC Wallaby Smartphone anticipates claim 1 [ 

The undersigned finds Apple’s arguments to be unpersuasive. [ 

] Thus, the HTC Wallaby Smartphone does not teach all of the limitations of claim 1 and as a result, does not anticipate claim 1 of the ’800 patent.

ii) Claims 2, 4, 6, 10, 11, 14, and 15

As the undersigned has already ruled above that Apple has failed to show, by clear and convincing evidence, that each and every limitation of claim 1 of the ’800 patent is anticipated by the HTC Wallaby Smartphone, the undersigned also finds that Apple has failed to show, by clear and convincing evidence, that the additional limitations in claims 2, 4, 6, 10, 11, 14, and 15 are anticipated by the HTC Wallaby Smartphone.
b) Qualcomm pdQ Smartphone

Apple claims that the Qualcomm pdQ Smartphones were sold in the United States by

HTC argues that Apple has failed to establish that the Qualcomm pdQ Smartphone qualifies as prior art. HTC claims that Apple failed to present a working version of the Qualcomm pdQ Smartphone and also failed to provide any evidence of an actual sale and use in the United States prior to the '800 patent.

Staff contends that the evidence shows that the Qualcomm pdQ Smartphones [ ]

The undersigned finds Apple’s arguments to be persuasive. [ ]

i) Claim 1

Apple claims that the Qualcomm pdQ Smartphone anticipates claim 1 because [ ]
Furthermore, Apple claims that, in the alternative, this limitation would be obvious in view of the knowledge of one skilled in the art or by combining the Qualcomm pdQ Smartphone with one of several prior art references. (*Id.* at 53-54 (citing RX-60 at 8:31-47; RX-791.1C at Q/A 819-27, 350, 616).)

HTC asserts that merely observing that the screen turns off after a period of inactivity does not necessarily satisfy the claim construction for sleep mode. (CIB at 46 (citing Mihran, Tr. at 1792:13-24).) For example, HTC claims that the device could be playing music files in which the screen would go blank, but the PDA would not be in sleep mode. (*Id.* at 46 (citing Mihran, Tr. at 1792:13-24, 1794:18-23; CX-1448.2C at Q/A 323).)

Staff contends that, similar to the HTC Wallaby,
Thus, Staff asserts that Apple has not demonstrated that Qualcomm pdQ Smartphone anticipates claim 1 because Apple has failed to prove that the amount of power supplied satisfies the claim construction for sleep mode.

The undersigned finds Apple’s arguments to be unpersuasive. [ ]

Apple fails to provide clear and convincing evidence of the amount of power consumed in the alleged sleep mode, thus failing to demonstrate that it meets the requirements of the claim construction. (CX-1448.2C at Q/A 310, 314-18.) [ ]

Thus, the Qualcomm pdQ Smartphone does not teach all of the limitations of claim 1, and as a result, does not anticipate claim 1 of the '800 patent.

**ii) Claims 2, 4, 6, 10, and 11**

As the undersigned has already ruled above that Apple has failed to show, by clear and convincing evidence, that each and every limitation of claim 1 of the '800 patent is anticipated by the Qualcomm pdQ Smartphone, the undersigned also finds that Apple has failed to show, by clear and convincing evidence, that the additional limitations in dependent claims 2, 4, 6, 10, and 11 are anticipated by the Qualcomm pdQ Smartphone.
c) **Kyocera 6035 Smartphone**

Apple asserts that the Kyocera 6035 Smartphone was first sold in the United States in

HTC does not dispute Apple’s claims that the Kyocera 6035 Smartphone qualifies as prior art to the ’800 patent.

Staff contends that the Kyocera 6035 Smartphone was sold[

The undersigned finds Apple’s arguments persuasive. [

i) **Claim 1**

Apple asserts that the Kyocera 6035 Smartphone anticipates claim 1 because it
HTC claims that the Kyocera 6035 Smartphone does not anticipate claim 1 and that

Staff contends that, similar to the HTC Wallaby, the Kyocera 6035 Smartphone

Thus, Staff asserts that Apple has not demonstrated that the

Kyocera 6035 Smartphone anticipates claim 1 [}
The undersigned finds Apple’s arguments to be unpersuasive. 

According to the claim construction, the sleep mode must meet the requirement that the amount of power supplied during the sleep mode is “less than any mode except for off mode.” (Order No. 29 at 22.) Apple has failed to show by clear and convincing evidence that 

Thus, the Kyocera 6035 Smartphone does not teach all of the limitations of claim 1 and as a result, the Kyocera 6035 Smartphone does not anticipate claim 1 of the ’800 patent.
ii) Claims 2, 4, 6, 10, 11, 14, and 15

As the undersigned has already ruled above that Apple has failed to show, by clear and convincing evidence, that each and every limitation of claim 1 of the ’800 patent is anticipated by the Kyocera 6035 Smartphone, the undersigned also finds that Apple has failed to show, by clear and convincing evidence, that the additional limitations in dependent claims 2, 4, 6, 10, 11, 14, and 15 are anticipated by the Kyocera 6035 Smartphone.

4. Obviousness

Apple contends that the asserted claims of the ’800 patent are invalid because they do nothing more than combine known techniques and apparatuses according to their known and ordinary uses to yield predictable results. (Id. at 59 (citing RX-791.1C at Q/A 819-20, 825, 827, 828, 829, 831-33).) Apple further asserts that HTC and its expert has not provided any evidence or analysis of secondary considerations that would support the validity of the ’800 patent. (RIB at 59.)

HTC asserts that Apple’s obviousness analysis only provides overarching allegations without supporting evidence, thereby failing to identify any reason or motivation why a person of ordinary skill in the art would combine his multiple cited references or use them to modify functionalities of the alleged prior art devices, or whether such combinations are even technically feasible. (CIB at 54.) In addition, HTC asserts that there is evidence of the secondary considerations of long-felt need in the art because many companies were working in the field of power management, yet failed to arrive at the invention of the ’800 patent. (Id. at 56 (citing CX-1448.2C at Q/A 673).)

Staff contends that the prior art references identified by Apple fail to clearly and convincingly demonstrate that the asserted claims would have been obvious under 35 U.S.C.
§ 103. (SIB at 69.) Staff also contends that HTC has not shown that its evidence of secondary
considerations is attributable to the claims of the ’800 patent. (Id. at 71.)

The undersigned does not find Apple’s arguments to be persuasive. It is Apple’s burden
to prove, by clear and convincing evidence that the ’800 patent is invalid. See Tech. Licensing
Corp. v. Videotek, Inc., 545 F.3d 1316, 1327 (Fed. Cir. 2008). Here, Apple makes nothing more
than a one-paragraph cursory argument that the claims of the ’800 patent are invalid. This is the
extent of Apple’s argument. Accordingly, the undersigned finds that simply making superficial
assertions and conclusory arguments is insufficient for Apple to meet the clear and convincing
standard necessary to invalidate the ’800 patent. Therefore, the undersigned finds that the
asserted prior art references do not render the ’800 patent obvious.

D. Domestic Industry – Technical Prong

HTC claims that it meets the technical prong of the domestic industry requirement
because the HTC Evo 4G, Incredible, Hero, Droid Eris, and T-Mobile G1 (“DI Products”)
practice claims 1 and 2 of the ’800 patent, [ ]

Apple asserts that HTC has not met the technical prong of the domestic industry
requirement because HTC has failed to show that the DI Products meet the “switching the PDA
system from normal mode to sleep mode when the PDA system has been idle for a second period
of time,” “implementing a power detection method comprising steps of: detecting an amount of
power of a source in the power system; switching the mobile phone system to off mode when the
detected amount is less than a first threshold; and switching the PDA system to off mode when
the detected amount is less than a second threshold,” and “switching the mobile phone system

- 75 -
from standby mode to sleep mode when the mobile phone system has been idle for a first period of time” limitations of claim 1 and the additional limitations of claim 2.

Staff contends that the DI Products do not meet the technical prong of the domestic industry requirement because the evidence does not show that the DI Products practice each and every element of claims 1 and 2. (SIB at 55.)

For the reasons discussed below, the undersigned agrees with Apple and Staff that HTC has failed to show, by a preponderance of the evidence, that the DI Products practice all of the limitations of claims 1 and 2 of the '800 patent, and thus, do not satisfy the technical prong of the domestic industry requirement.

1. “implementing a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off mode when the detected amount is less than a second threshold”

HTC claims that the DI Products practice this limitation of claim 1 [ ] HTC also claims that this element is present under the doctrine of equivalents because [ ]
Staff agrees with Apple and contends that [The undersigned finds Apple's arguments persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the DI Products practice this limitation of claim 1. [
Thus, the DI Products do not practice the “implementing a power detection method comprising steps of: detecting an amount of power of a source in the power system; switching the mobile phone system to off mode when the detected amount is less than a first threshold; and switching the PDA system to off mode when the detected amount is less than a second threshold” limitation of claim 1, and as a result, do not practice all of the limitations of claim 1.

Similarly, the undersigned finds that HTC has failed to prove, by a preponderance of the evidence, that the DI Products meet this limitation under the doctrine of equivalents. Even if HTC’s assertions are accepted that the “detecting an amount of power of a source in the power system” portion of the limitation is met under the doctrine of equivalents, HTC still provides no argument that the rest of the limitation is met. Therefore, the undersigned finds that HTC has not met its burden of proving, by a preponderance of the evidence, that the DI Products met this limitation under the doctrine of equivalents.

Therefore, the DI Products do not practice all of the limitations of claim 1 of the ’800 patent.

2. Claim 2

As the undersigned has already ruled above that HTC has failed to show, by a preponderance of the evidence, that the DI Products practice each and every limitation of claim 1 of the ’800 patent, the undersigned also finds that HTC has failed to show, by a preponderance of the evidence, that the DI Products practice each and every limitation of claim 2 because claim 2 depends from claim 1.
3. Conclusion

In conclusion, the DI Products do not practice all of the limitations of claims 1 and 2 of the ’800 patent and thus, do not satisfy the technical prong of the domestic industry requirement.

VII. THE ’505 PATENT

A. Overview

HTC alleges that Apple violates Section 337 through the importation, the sale for importation, and the sale within the United States after importation of the original iPhone, iPhone 3G, iPhone 3GS, iPhone 4, CDMA iPhone, first generation iPad, Wi-Fi and 3G models, iPad2, Wi-Fi and 3G models, and first, second, third, and fourth generation iPod Touch models (collectively, “the Accused Products”), that infringe, literally and under the Doctrine of Equivalents, asserted claims 1 and 2 of U.S. Patent No. 7,716,505 (“the ’505 patent”).

1. Asserted Claims

Two claims of the ’505 patent are asserted against Respondent, namely independent claim 1, along with dependent claim 2. These claims read as follows:

1. A power control method for a portable electronic device, which has a processor for processing data, a non-volatile memory, a volatile memory for storing data, and a battery for supplying power to the processor, the non-volatile memory and the volatile memory, the method comprising: storing data from the volatile memory into the non-volatile memory and stopping supplying power to the volatile memory when the remaining power of the battery is less than a predetermined amount; maintaining only sufficient power to restore the device; determining whether the remaining power of the battery exceeds an amount required for a normal device operation; and when the remaining power of the battery exceed [sic] the amount, supplying power to the volatile memory and accessing data from the non-volatile memory to initiate the normal device operation; and determining whether a specific input signal has been received by the portable electronic device; and supplying power to the volatile memory upon receiving the specific input signal and accessing data from the non-volatile memory to initiate the normal device operation after initialization.
2. The power control method as claimed in claim 1 further comprising: stopping supplying power to the processor and the non-volatile memory after storing data from the volatile memory into the non-volatile memory.

(JX-2 at 6:21-48.)

2. **Claim Construction**

As noted above, the undersigned has already construed the above claims in a *Markman* order. (Order No. 29.) A summary of the claims construed in that order is detailed below:

<table>
<thead>
<tr>
<th>Claim</th>
<th>Term</th>
<th>Construction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Claim 1</td>
<td>non-volatile memory</td>
<td>storage media that retains data in the absence of power, excluding hard disks</td>
</tr>
<tr>
<td>Claim 1</td>
<td>volatile memory</td>
<td>storage media that requires power to retain data</td>
</tr>
<tr>
<td>Claim 1</td>
<td>storing data from the volatile memory into the non-volatile memory and stopping supplying power to the volatile memory when the remaining power of the battery is less than a predetermined amount</td>
<td>in response to determining that the remaining power of the battery is less than a predetermined amount: (i) transferring data from the volatile memory into the non-volatile memory; and (ii) stopping supplying power to the volatile memory</td>
</tr>
<tr>
<td>Claim 1</td>
<td>maintaining only sufficient power to restore the device</td>
<td>maintaining no more power than that sufficient to allow determination of whether: (1) the remaining power of the battery exceeds an amount required for a normal device operation; and (2) a specific input signal has been received by the portable electronic device</td>
</tr>
<tr>
<td>Claim 1</td>
<td>determining whether the remaining power of the battery exceeds an amount required for a normal device operation</td>
<td>determining whether the remaining power of the battery is greater than an amount required for performing one or more normal device operations</td>
</tr>
</tbody>
</table>
Claim 1

**Claim Term Construction**

<table>
<thead>
<tr>
<th>Claim</th>
<th>Term</th>
<th>Construction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Claim 1</td>
<td>when the remaining power of the battery exceed [sic] the amount, supplying power to the volatile memory and accessing data from the non-volatile memory to initiate the normal device operation</td>
<td>in response to determining that the remaining power of the battery is greater than the amount required for performing one or more normal device operations: (i) supplying power to the volatile memory; and (ii) accessing data from the non-volatile memory to allow the device to begin performing the one or more normal device operations.</td>
</tr>
<tr>
<td>Claim 1</td>
<td>supplying power to the volatile memory upon receiving the specific input signal and accessing data from the non-volatile memory to initiate the normal device operation after initialization</td>
<td>upon receipt of a predefined input signal, supplying power to the volatile memory and accessing data from the non-volatile memory to allow the device to perform the one or more normal device operations after setting the device to a state in which it will work normally.</td>
</tr>
</tbody>
</table>

B. Infringement

1. Direct Infringement

a) Claim 1

HTC asserts that Apple and its customers use each of the Accused Products to practice the method of claim 1 of the '505 patent. According to HTC, Apple designed the Accused Products to infringe and actively induces its users, by providing instructional documentation such as user guides and programming guides, to practice every step of the asserted claims. HTC asserts that Apple attempts to interpret the claims in a way rejected by the claim construction and misapplies the claim construction. (CIB at 8.)

Apple asserts that HTC fails to establish direct infringement because it failed to prove, on a limitation-by-limitation basis, that anyone at Apple ever practiced the entirety of any asserted claim. (RIB at 85.) In addition, Apple asserts that [ ]
In Staff’s view, the evidence shows that independent claim 1 of the '505 patent is not infringed by the Accused Products. (SIB at 72.) In particular, Staff contends that the Accused Products do not practice several elements of claim 1. (Id. at 73.)

For the reasons discussed below, the undersigned finds that HTC has failed to prove, by a preponderance of the evidence, that the Accused Products practice each and every limitation of claim 1 of the '505 patent.

i) "maintaining only sufficient power to restore the device"

HTC asserts that each Accused Product practices this limitation when [non-disclosed]. Apple claims that the Accused Products [non-disclosed]. (RIB at 73; See Order No. 29 at 43.) Specifically, Apple claims that [non-disclosed].
Staff agrees with Apple and contends that the evidence demonstrates that in [ (Id.) Instead, Staff claims that the evidence shows that [ (Id. at 81) Thus, Staff contends that in ] the Accused Products [ ]
The undersigned finds the arguments of Apple to be persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the Accused Products practice this limitation of claim 1. This limitation is construed as “maintaining no more power than that sufficient to allow determination of whether: (1) the remaining power of the battery exceeds an amount required for a normal device operation; and (2) a specific input signal has been received by the portable electronic device.” (Order No. 29 at 43.) Contrary to HTC’s assertions, [Q/A 59, 65-66.) Thus, the Accused Products do not [as recited in claim 1.

ii) “when the remaining power of the battery exceed [sic] the amount, supplying power to the volatile memory and accessing data from the non-volatile memory to initiate the normal device operation”

HTC asserts that each Accused Product practices this limitation when []
According to HTC, [device. (CIB at 66 (citing CX-1405.2C at Q/A 2767-2806, 2820-59, 3079-3117, 3130-68, 3366-3402, 3413-49; CFF 5.1233-74, 5.1286-1317).) HTC claims that the [Apple asserts that the Accused Products do not practice this limitation because the Accused Products [Order 29 at 47-48; RX-807.1C at Q/A 413).] Instead, Apple claims that the [RX-807.1C at Q/A 410-11, 400, 402; JX-39C at 21-32; RX-339 at 18; JX-902C at 201:16-202:8, 312:16-338:13; Williams, Tr. at 398:2-399:5, ]
Apple further contends that [509:1-25].) (Id. at 63-64 (citing RX-807.1C at Q/A 410-11, 400, 402; JX-39C at 21-32; RX-339 at 18; JX-902C at 201:16-202:8, 312:16-338:13; Williams, Tr. at 398:2-399:1, 412:4-24, 509:1-25; Alpert, Tr. at 1535:9-14).) Thus Apple asserts that the [Williams, Tr. at 392:17-24, 398:2-399:5, 403:5-9, 509:1-25).) Accordingly, Apple contends that the Accused Products do not meet this limitation of claim 1.

Staff contends that there is no dispute that [104:67].) (SIB at 74 (citing Williams, Tr. 398-99; JX-39C; RX-807.1C at Q/A 257).) Staff claims that the claim construction correctly determined that “when” means “in response to,” not merely “after” (i.e., there is a cause and effect relationship). (Id. at 76-77 (citing Order No. 29 at 48).) Thus, Staff claims that the evidence shows that the [39C at 721APPLE90060297, Table 3).) Thus, Staff submits that the Accused Products do not practice this limitation of claim 1.
The undersigned finds the arguments of Apple to be persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the Accused Products practice this limitation of claim 1. [32; RX-339 at 18; JX-902C at 328:10-330:18; Williams, Tr. at 398:2-399:1; Alpert, Tr. at 1535:9-14.) Thus, the Accused Products do not [ ] as required by the claim construction and do not practice this limitation of claim 1.

iii) “determining whether the remaining power of the battery exceeds an amount required for a normal device operation”

HTC asserts that each Accused Product practices this limitation when, [2754-66, 3068-78, 3356-65; CFF 5.1207-1252).) HTC further asserts that when this determination is made, [ ] (Id. at 63-64 (citing CX-1405.2C at Q/A 2754-66, 3068-78, 3356-65; CFF 5.1207-1252; RX-806C at Q/A 56-57, 90.1, 91; RX-802C at Q/A 36, 43, 44; Novick, Tr. at 1227:19-1228:1, 1230:3-7, 1231:3-1233:6).) HTC also claims that [ ]
Apple claims that the determination [Q/A 368, 400-01).] Apple further claims that [66, 391-92, 400-01; Williams, Tr. at 413:13-414:13, 415:3-21, 421:14-422:18).] Thus, Apple

- 88 -
Staff contends that [...]

The undersigned finds the arguments of Apple to be persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the Accused Products practice this limitation of claim 1. When the [...]

Thus, the Accused Products do not practice this limitation of claim 1.

In conclusion, the Accused Products do not practice all of the limitations of claim 1 and thus, do not infringe claim 1 of the '505 patent.
b) Claim 2

Claim 2 depends from independent claim 1 of the ’505 patent. Because the undersigned has found hereinabove that the Accused Products do not infringe independent claim 1, dependent claim 2 is also not infringed. *Muniauction, Inc. v. Thomson Corp.*, 532 F.3d 1318, 1328-29 n.5 (Fed. Cir. 2008) ("A conclusion of noninfringement as to the independent claims requires a conclusion of noninfringement as to the dependent claims."); *Monsanto Co. v. Syngenta Seeds, Inc.*, 503 F.3d 1352, 1359 (Fed. Cir. 2007) ("One who does not infringe an independent claim cannot infringe a claim dependent on (and thus containing all the limitations of) that claim."); *Wahpeton Canvas Co. v. Frontier, Inc.*, 870 F.2d 1546, 1553 (Fed. Cir. 1989) ("It is axiomatic that dependent claims cannot be found infringed unless the claims from which they depend have been found to have been infringed.")

2. Contributory and Induced Infringement

The undersigned finds that because HTC has not proven direct infringement, it cannot prove indirect infringement. Accordingly, HTC has failed to show that Apple contributorily infringes or induces infringement of the asserted claims of the ’505 patent. *See BMC Res.*, 498 F.3d at 1379 (direct infringement must first be established in order for a claim of indirect infringement to prevail); *see also i4i Ltd. P’ship*, 598 F.3d at 851 ("To prove inducement, the patentee must show direct infringement."); *Spansion*, 629 F.3d at 1353 (complainant alleging contributory infringement must show an act of direct infringement in violation of 337).

C. Validity

1. Ordinary Skill in the Art

As previously stated in Order No. 29, one of ordinary skill in the art would be an engineer with a bachelor’s degree or higher in electrical or computer engineering and one or more years of experience working with portable electronic devices. (Order No. 29 at 7.)

- 90 -
2. **Priority Date**

HTC contends that the priority date for the ’505 patent should be May 15, 2003. HTC claims that the ’505 patent claims the benefit of priority to the May 15, 2003 filing date of its corresponding Taiwanese application. HTC further claims that the Taiwanese application contains a full and enabling written description supporting all claimed subject matter. (CIB at 78 (citing CDX-8903C; CX-1448.2C at Q/A 906; CFF 5.4384-86).)

Staff agrees with HTC that the evidence supports a priority date for the ’505 patent of May 15, 2003. (SIB at 93 (citing RX-286).) Staff contends that the evidence demonstrates that the corresponding Taiwanese application discloses and enables the subject matter recited in the claims of the ’505 patent. (Id. (citing CX-1448.2C at Q/A 906).)

The undersigned finds HTC’s arguments persuasive. The evidence shows that the ’505 patent claims priority to the corresponding Taiwanese application, which was filed on May 15, 2003. (JX-2; RX-286.) The evidence further shows that the Taiwanese application discloses the subject matter recited in the claims of the ’505 patent. (RX-286 at 721APPLE90060032-62.) In reviewing the certified translation of the Taiwanese application, the undersigned finds that the specification of the Taiwanese application is very similar to the specification of the ’505 patent. Thus, the priority date for the ’505 patent should be May 15, 2003.

3. **Anticipation**

Apple asserts that each asserted claim of the ’505 patent is anticipated by U.S. Patent No. 7,225,353 (“Wong”). (RIB at 96 (citing RX-55; RX-791.1C at Q/A 961).)

HTC asserts that the ’505 patent is valid because Wong fails to disclose several elements. (CIB at 81.)

In Staff’s view, Wong does not clearly and convincingly disclose and enable each element of claim 1 and thus does not anticipate the ’505 patent. (SIB at 94.)
For the reasons discussed below, the undersigned finds that Apple has failed to prove, by clear and convincing evidence, that Wong anticipates the asserted claims of the '505 patent.

a) Wong

Both Apple and Staff contend that Wong issued on May 29, 2007 from an application filed on October 3, 2001 and thus qualifies as prior art under 35 U.S.C. §§ 102(e) and 103(a). (RIB at 97 (citing RX-55 at 1); SIB at 93 (citing RX-55 at 1).)

The undersigned finds that the evidence shows that Wong issued on May 29, 2007 from an application filed on October 3, 2001 and thus qualifies as prior art under 35 U.S.C. §§ 102(e) and 103(a). (RX-55 at 1.)

i) Claim 1

Apple claims that Wong teaches saving data from RAM to non-volatile storage in response to the battery power level reaching a predetermined low threshold for a portable device. (RIB at 97 (citing RX-55 at 1:6-10; RX-791.1C at Q/A 962).) Apple claims that Wong discloses transferring data from volatile to non-volatile memory in response to a low battery condition. (Id. at 98 (citing RX-791.1C at Q/A 970; RX-55 at 2:1-5, 1:6-10).) Apple further claims that Wong discloses that a battery capacity monitor sends a low battery signal to the processor when the remaining battery capacity is sufficient to copy information from RAM to non-volatile storage. (Id. (citing RX-791.1C at Q/A 971; RX-55 at 5:25-32, 5:49-53).) Apple claims that Wong teaches that in response to the low battery signal, the process copies information from volatile RAM to non-volatile memory, such as flash memory. (Id. (citing RX-791.1C at Q/A 974; RX-55 at Fig. 3 (step 340), 5:39-44, 6:22-27, 7:62-64).) Apple also claims that Wong teaches that the battery capacity monitor generates a power-on reset signal indicating that sufficient energy is in the system to begin normal operation. Apple claims that Wong teaches that when the battery is dead, the power-on reset signal is inactive. Apple further claims that
Wong teaches that when energy has been added to the system by removing, recharging and replacing the battery, the power-on reset signal button becomes active. (Id. (citing RX-55 at 6:54-59; RX-791.1C at Q/A 978).) Finally, Apple claims that Wong discloses that when the battery charge monitor determines the battery has been recharged above an amount required for normal operation, it generates a power-on reset signal, which will initiate the process for restoring information from non-volatile to volatile storage. (Id. at 100 (citing RX-791.1C at Q/A 981).)

HTC claims that Wong fails to disclose several elements of claim 1 of the '505 patent. HTC claims that Wong discloses that information is copied from volatile to non-volatile memory when the battery discharges to so low a level that it cannot operate the device after the copying operation and thus, there is no active stopping of the supply of power since the battery continues to supply power but at an insufficient level to operate the device. (CIB at 81 (citing RX-55 at 5:37-38; CX-1448.2C at Q/A 778-80).) HTC claims that with an empty, dead, or removed battery, there is no power available to allow for subsequent determining steps. (Id. at 82 (citing CX-1448.2C at Q/A 783).) HTC also claims that when there is no battery power, then there are no signals generated nor power maintained to allow for the determinations of the maintaining step. (Id. (citing CX-1448.2C at Q/A 786).) HTC claims that Wong does not disclose how a battery measurement is utilized and whether it is used for determining whether the remaining power of the battery exceeds an amount required for a normal device operation. (Id. (citing CX-1448.2C at Q/A 793).) Finally, HTC claims that Apple fails to identify any data or conditions stored in the non-volatile memory to set the device to a state in which it will work normally. (Id. at 83.)
Staff contends that Wong does not anticipate claim 1 because it does not disclose “stopping supplying power to the volatile memory when the remaining power of the battery is less than a predetermined amount.” (SIB at 94.) Instead, Staff contends that Wong only describes placing the volatile memory (i.e., RAM) in a low power data retention mode, which is not “stopping supplying of power” to the volatile memory. (Id. (citing RX-55 at 6:12-18.).)

The undersigned finds Apple’s arguments to be unpersuasive. Wong does not disclose “stopping supplying power to the volatile memory when the remaining power of the battery is less than a predetermined amount,” as recited in claim 1. According to Wong, when a predetermined amount of energy remains in the battery, the system enters a lock out mode and the volatile RAM is placed in a low power data retention mode. (RX-55 at 6:9-17.) Since the volatile RAM is placed in a low power mode, and not a zero power mode, Wong does not disclose “stopping supplying power to the volatile memory.” Thus, Wong does not teach all of the limitations of claim 1 and as a result, Wong does not anticipate claim 1 of the ’505 patent.

ii) Claim 2

As the undersigned has already ruled above that Apple has failed to show, by clear and convincing evidence, that each and every limitation of claim 1 of the ’505 patent is anticipated by Wong, the undersigned also finds that Apple has failed to show, by clear and convincing evidence, that the additional limitation in dependent claim 2 is anticipated by Wong.

4. Obviousness

Apple claims that Wong renders obvious each of the asserted claims of the ’505 patent “because they do nothing more than combine conventional and well-known techniques, such as data preservation through hibernation, ‘deep sleep,’ ‘save to disk’ and restore processes, with other conventional well-known techniques, such as power management in portable devices, to obtain predictable results.” (RIB at 101 (citing RX-791.1C at Q/A 862-65, 988-90, 992-99,
Apple also claims that HTC has provided no evidence of secondary considerations to support validity.

HTC asserts that Apple only provides generalized arguments regarding obviousness. Additionally, HTC claims that there are objective indicia of non-obviousness because there was a long-felt need in the art for power management at the time of the '505 patent and many of the leading engineering and manufacturing companies were working in the field of power management, yet failed to arrive at the invention of the '505 patent. (CIB at 85 (citing CX-1448.2C at Q/A 673).)

Staff contends that Apple fails to clearly and convincingly demonstrate that claim 1 of the '505 patent is obvious. (SIB at 97.) Staff further contends that HTC’s evidence of non-obviousness is too thin to support a conclusion that the commercial success of the Accused Products, or any devices sold by HTC, is related to their practice of any of the asserted claims of the '505 patent because HTC failed to meet its burden of proving any nexus between the DI Products and the merits of the invention in the '505 patent. (Id. at 100.)

The undersigned does not find Apple’s arguments to be persuasive. It is Apple’s burden to prove, by clear and convincing evidence that the '505 patent is invalid. See Tech. Licensing, 545 F.3d at 1327. Here, Apple makes nothing more than a one-paragraph cursory argument that the claims of the '505 patent are invalid. This is the extent of Apple’s argument. Accordingly, the undersigned finds that simply making superficial assertions and conclusory arguments is insufficient for Apple to meet the clear and convincing standard necessary to invalidate the '505 patent. Therefore, the undersigned finds that Wong does not render the '505 patent obvious.
D. Domestic Industry – Technical Prong

HTC claims that it meets the technical prong of the domestic industry requirement because the HTC Evo 4G, Incredible, Hero, Droid Eris, and T-Mobile G1 ("DI Products") practice claims 1 and 2 of the '505 patent, and that [ ]

Apple asserts that HTC has not met the technical prong of the domestic industry requirement because HTC has failed to show that the DI Products meet the "when the remaining power of the battery exceed the amount, supplying power to the volatile memory and accessing data from the non-volatile memory to initiate the normal device operation," "maintaining only sufficient power to restore the device," "determining whether the remaining power of the battery exceeds an amount required for a normal device operation," and "supplying power to the volatile memory upon receiving the specific input signal and accessing data from the non-volatile memory to initiate the normal device operation after initialization" limitations of claim 1 and the additional limitations of claim 2.

Staff contends that the DI Products do not meet the technical prong of the domestic industry requirement because the evidence does not show that the DI Products practice each and every element of claim 1. (SIB at 86.)

For the reasons discussed below, the undersigned agrees with Apple and Staff that HTC has failed to show, by a preponderance of the evidence, that the DI Products practice all of the limitations of claims 1 and 2 of the '505 patent.
1. Claim 1

   a) "maintaining only sufficient power to restore the device"

HTC claims that when the DI Products shut down, [Apple claims that the DI Products[}
Staff agrees with Apple that the DI Products []

The undersigned finds Apple's arguments persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the DI Products practice this limitation of claim 1. This limitation has been construed as "maintaining no more power than that sufficient to allow determination of whether: (1) the remaining power of the battery exceeds an amount required for a normal device operation; and (2) a specific input signal has been received by the portable electronic device." (Order No. 29 at 43.) [ ]
Thus, the DI Products do not practice this limitation of claim 1.

b) “when the remaining power of the battery exceed [sic] the amount, supplying power to the volatile memory and accessing data from the non-volatile memory to initiate the normal device operation”

HTC claims that [ ]

] In addition, HTC claims that the DI Products practice this claim limitation under the doctrine of equivalents because they provide substantially the same function, in substantially
the same say, to provide substantially the same result as the recited claim element. (Id. at 76-77.)

Apple claims that in the DI Products,
Staff contends that the claim construction for this limitation reflects a cause and effect relationship. (SIB at 86-87.) However, Staff claims that [ ]

The undersigned finds Apple's arguments persuasive and that HTC has failed to prove, by a preponderance of the evidence, that the DI Products practice this limitation of claim 1. This limitation has been construed to mean "in response to determining that the remaining power of
the battery is greater than the amount required for performing one or more normal device operations: (i) supplying power to the volatile memory; and (ii) accessing data from the non-volatile memory to allow the device to begin performing the one or more normal device operations.” (Order No. 29 at 49.) [ 

] Thus, the DI Products do not practice this limitation of claim 1.

With respect to the doctrine of equivalents, the undersigned finds Apple and Staff’s arguments persuasive. Prosecution history estoppel may bar a patentee from relying on the doctrine of equivalents if the scope of the claims has been narrowed by amendments during prosecution. Honeywell Int’l Inc. v. Hamilton Sundstrand Corp., 370 F.3d 1131, 1139-41 (Fed. Cir. 2004) (citing Warner-Jenkinson, 520 U.S. at 22, 33-34; Festo Corp. v. Shoketsu Kinzoku Kogyo Kabushiki Co., 535 U.S. 722, 733-34, 741 (2002)). Here, HTC is precluded from relying on the doctrine of equivalents for this limitation because of amendments made during prosecution of the ’505 patent. (See JX-6 at PH0001196-120424.) During prosecution of the

---

24 While Apple and Staff refer to the January 4, 2010 amendment in the prosecution history file of the ’505 patent at PH0000553 of JX-6, the undersigned finds that this Amendment is found at PH0001196-1204 of JX-6.
application that issued as the ’505 patent, the phrases “remaining power of the battery” and “normal device operation” were added to claim 1 by amendments. (Id. at PH0001202.) The undersigned finds that these amendments were made for the purposes of patentability because HTC argued that Clark and Bondi did not disclose the combination of elements as set forth in amended claim 1. Thus, in view of these narrowing amendments, there is a presumption against finding infringement under the doctrine of equivalents. See Honeywell, 370 F.3d at 1139-41. Therefore, the undersigned finds that HTC has not met its burden of proving, by a preponderance of the evidence, that the Accused Products infringe this limitation of claim 1 under the doctrine of equivalents.

2. Claim 2

As the undersigned has already ruled above that HTC has failed to show, by a preponderance of the evidence, that the DI Products meet each and every limitation of claim 1 of the ’505 patent, the undersigned also finds that HTC has failed to show, by a preponderance of the evidence, that the DI Products meet each and every limitation of dependent claim 2.

3. Conclusion

In conclusion, the DI Products do not practice all of the limitations of claims 1 and 2 of the ’505 patent and thus, do not satisfy the technical prong of the domestic industry requirement.

VIII. DOMESTIC INDUSTRY – ECONOMIC PRONG

HTC has established that it meets the economic prong of the domestic industry requirement under section 337. (See Order No. 40 (Mar. 15, 2011); Notice of Comm’n Determination Not to Review an Initial Determination Granting Complainant’s Motion for Summary Determination That It Has Met the Economic Prong of the Domestic Industry Requirement (Apr. 5, 2011).)
IX. CONCLUSIONS OF LAW

1. The Commission has personal jurisdiction over the parties, and subject-matter jurisdiction over the accused products.

2. The importation or sale requirement of Section 337 is satisfied.

3. The accused products do not infringe claims 1 and 10 of U.S. Patent No. 5,541,988.

4. The accused products do not infringe claims 8 and 9 of U.S. Patent No. 6,320,957.

5. Apple does not induce infringement of the asserted claims of U.S. Patent No. 5,541,988.

6. Apple does not induce infringement of the asserted claims of U.S. Patent No. 6,320,957.

7. The accused products do not infringe claims 1, 2, 4, 6, 10, 11, 14, and 15 of U.S. Patent No. 6,999,800.

8. Apple does not induce infringement of the asserted claims of U.S. Patent No. 6,999,800.

9. Apple does not contribute to the infringement of the asserted claims of U.S. Patent No. 6,999,800.

10. The accused products do not infringe claims 1 and 2 of U.S. Patent No. 7,716,505.


12. Apple does not contribute to the infringement of the asserted claims of U.S. Patent No. 7,716,505.


19. The technical prong of the domestic industry requirement for U.S. Patent Nos. 5,541,988 and 6,320,957 has been satisfied.

20. The technical prong of the domestic industry requirement for U.S. Patent No. 6,999,800 has not been satisfied.

21. The technical prong of the domestic industry requirement for U.S. Patent No. 7,716,505 has not been satisfied.

22. The economic prong of the domestic industry requirement for has been satisfied for U.S. Patent Nos. 7,716,505; 6,999,800; 5,541,988; and 6,320,957.


25. There is no violation of 19 U.S.C. § 1337(a)(1) with respect to U.S. Patent No. 6,999,800.
X. INITIAL DETERMINATION

Based on the foregoing, it is the Initial Determination of the undersigned that a violation of section 337 of the Tariff Act of 1930, as amended, 19 U.S.C. § 1337, has not been found in the importation into the United States, the sale for importation, or the sale within the United States after importation of certain portable electronic devices and related software that infringe one or more of claims 1, 2, 4, 6, 10, 11, 14, and 15 of U.S. Patent No. 6,999,800; claims 1 and 2 of U.S. Patent No. 7,716,505; claims 8 and 9 of U.S. Patent No. 6,320,957; and claims 1 and 10 of U.S. Patent No. 5,541,988.25

The undersigned hereby CERTIFIES to the Commission this Initial Determination, together with the record of the hearing in this investigation consisting of the following: the transcript of the evidentiary hearing, with appropriate corrections as may hereafter be ordered; and the exhibits accepted into evidence in this investigation as listed in the attached exhibit lists.26

The Secretary shall serve a public version of this Initial Determination upon all parties of record and the confidential version upon counsel who are signatories to the Protective Order (Order No. 1), the Amended Protective Order (Order No. 7), and the Supplemental Protective Order (Order No. 12) issued in this Investigation, and upon the Commission Investigative Attorney.

Pursuant to 19 C.F.R. § 210.42(h), this Initial Determination shall become the determination of the Commission unless a party files a petition for review pursuant to 19 C.F.R.

---

25 The failure to discuss any matter raised by the parties or any portion of the record herein does not indicate that said matter was not considered. Rather, any such matter(s) or portion(s) of the record has/have been determined to be irrelevant, immaterial or meritless. Arguments made on brief which were otherwise unsupported by record evidence or legal precedent have been accorded no weight. Additionally, any arguments from the parties’ pre-hearing briefs incorporated by reference into the parties’ post-hearing briefs are stricken, unless otherwise discussed herein, as an improper attempt to circumvent the page limits imposed for post-hearing briefing.

26 The pleadings of the parties filed with the Secretary are not certified as they are already in the Commission’s possession in accordance with Commission rules.
§ 210.43(a) or the Commission, pursuant to 19 C.F.R. § 210.44, orders on its own motion a review of the Initial Determination or certain issues therein.
RECOMMENDED DETERMINATION ON REMEDY AND BOND

I. REMEDY AND BONDING

The Commission’s Rules provide that subsequent to an initial determination on the question of violation of section 337 of the Tariff Act of 1930, as amended, 19 U.S.C. § 1337, the administrative law judge shall issue a recommended determination concerning the appropriate remedy in the event that the Commission finds a violation of section 337, and the amount of bond to be posted by respondent during Presidential review of the Commission action under section 337(j). See 19 C.F.R. § 210.42(a)(1)(ii).

A. Limited Exclusion Order

Under Section 337(d), the Commission may issue a limited exclusion order directed to a respondent’s infringing products. 19 U.S.C. § 1337(d). A limited exclusion order instructs the U.S. Customs Service to exclude from entry all articles that are covered by the patent at issue that originate from a named respondent in the investigation. Fuji Photo Film Co. Ltd. v. Int’l Trade Comm’n, 474 F.3d 1281, 1286 (Fed. Cir. 2007.)

HTC requests that a permanent limited exclusion order be issued prohibiting the importation of all of Apple’s infringing portable electronic devices and related software. (CIB at 144.) HTC asserts that a limited exclusion order is “necessary to prevent continued importation of infringing products into the U.S,” that it should apply to imports of infringing Apple products by anyone, not just imports by Apple, and that it should be directed to the related software to prevent Apple from importing the infringing software and installing it on other portable electronic devices after entry in the U.S. (Id.)

While Apple believes that any remedy should be limited to a cease and desist order, Apple submits that should an exclusion order issue, it should include a quarterly reporting
requirement by HTC, contain an exception to permit software updates and repairs for existing users of the accused devices, and include a certification provision. (RIB at 145-147.) Apple also asserts that the limited exclusion order, at least with respect the Dialer Patents, should include an express statement that it will terminate upon the expiration of said patents. (Id. at 146.)

Staff supports the issuance of a limited exclusion order should a violation be found. (SIB at 136-137.) In Staff’s view, a certification provision may be appropriate. (Id. at 137.)

Although the undersigned has found no violation of section 337, should the Commission nonetheless find a violation, the undersigned recommends that a limited exclusion order issue that covers all of Apple’s accused portable electronic devices and related software found to infringe the asserted patents. The undersigned further recommends that the limited exclusion order include a certification provision to the U.S. Customs and Border Protection. As both Staff and Apple correctly noted, “[c]ertification provisions are often included when, as here, affected respondents import both allegedly infringing and non-infringing products.” (RIB at 146; SIB at 137.)

B. Cease and Desist Order

Under Section 337(f)(1), the Commission may issue a cease and desist order in addition to, or instead of, an exclusion order. 19 U.S.C. § 1337(f)(1). The Commission generally issues a cease and desist order directed to a domestic respondent when there is a “commercially significant” amount of infringing, imported product in the United States that could be sold, thereby undercutting the remedy providing by an exclusion order. See Certain Crystalline Cefadroxil Monohydrate, Inv. No. 337-TA-293, USITC Pub. 2391, Comm’n Op. on Remedy, the Public Interest and Bonding at 37-42 (June 1991); Certain Condensers, Parts Thereof and Prods.
HTC asserts that a cease and desist order is warranted for Apple has stipulated that it [ ] (CIB at 144.) Apple contends that HTC has failed to meet its burden to establish the need for a cease and desist order. (RIB at 147.) However, should the Commission issue a cease and desist order, it should, Apple insists, be limited to products for which there is evidence of commercially significant domestic inventories. (Id.) Staff concurs with HTC, finding a cease and desist order appropriate given the fact that [ ] (SIB at 138.)

There is no dispute that Apple maintains [ ] of the accused products. (See CX-714.) The undersigned therefore recommends that the Commission issue a cease and desist order in this Investigation, if the Commission determines a violation of section 337 has occurred.

C. Bond During Presidential Review Period

Pursuant to Section 337(j)(3), the Administrative Law Judge and the Commission must determine the amount of bond to be required of a respondent during the 60-day Presidential review period following the issuance of permanent relief, in the event that the Commission determines to issue a remedy. The purpose of the bond is to protect the complainant from any injury. 19 C.F.R. § 210.42(a)(1)(ii), § 210.50(a)(3).

When reliable price information is available, the Commission has often set the bond by eliminating the differential between the domestic product and the imported, infringing product. See Microsphere Adhesives, Processes for Making Same, and Prods. Containing Same,
Including Self-Stick Repositionable Notes, Inv. No. 337-TA-366, USITC Pub. 2949, Comm’n Op. at 24 (Dec. 8, 1995). In other cases, the Commission has turned to alternative approaches, especially when the level of a reasonable royalty rate could be ascertained. See, e.g., Certain Integrated Circuit Telecomm. Chips and Prods. Containing Same, Including Dialing Apparatus, Inv. No. 337-TA-337, Comm’n Op. at 41, 1993 WL 13033517, at *24 (U.S.I.T.C. June 22, 1993). A 100 percent bond has been required when no effective alternative existed. See, e.g., Certain Flash Memory Circuits and Prods. Containing Same, Inv. No. 337-TA-382, USITC Pub. No. 3046, Comm’n Op. at 26-27 (July 1997) (imposing a 100% bond when price comparison was not practical because the parties sold products at different levels of commerce, and the proposed royalty rate appeared to be de minimis and without adequate support in the record).

HTC requests that Apple be required to post a bond equal to 100% of the entered value of any imported Apple portable electronic device. (CIB at 145.) Apple asserts that HTC has not demonstrated the need for a bond to cover entries of the accused products during the 60-day Presidential review period. (RIB at 147-148.) If, however, the Commission determines that a bond is appropriate, Apple contends that “a bond equivalent to the objective value of the asserted technology, reflected in lump sum license payments, will be more than sufficient to protect HTC from any potential injury.” (Id. at 148-149.) In Staff’s view, HTC has not met its burden of proving an appropriate bond amount and thus, no bond is appropriate. (SIB at 138-139.)

The undersigned agrees with Apple and Staff that HTC has failed to meet its burden to justify the imposition of any bond. See Certain Rubber Antidegradants, Components Thereof, and Prods. Containing Same, Inv. No. 337-TA-533, Comm’n Op. at 40, 2006 ITC LEXIS 591, at *60 (Jul. 21, 2006). HTC claims “no price comparison is possible,” yet this appears to be due to the lack of pricing information for HTC’s products, not the accused products. Furthermore,
HTC has offered no evidence of a reasonable royalty rate from which a bond amount can be determined. Thus, in the event that the Commission finds a violation, the undersigned recommends no bond be set.

Within seven days of the date of this document, each party shall submit to the Office of the Administrative Law Judges a statement as to whether or not it seeks to have any portion of this document deleted from the public version. The parties' submissions must be made by hard copy by the aforementioned date and must include a copy of this document with red brackets indicating any portion asserted to contain confidential business information to be deleted from the public version, along with a list indicating each page on which such a bracket is to be found. The parties' submissions concerning the public version of this document need not be filed with the Commission.

SO ORDERED.

Charles E. Bullock
Acting Chief Administrative Law Judge
IN THE MATTER OF CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE

CERTIFICATE OF SERVICE

I, James R. Holbein, hereby certify that the attached Public Version Initial Determination On Violation Of Section 337 And Recommended Determination On Remedy And Bond has been served upon, Jeffrey T. Hsu, Esq., Commission Investigative Attorney, and the following parties via first class mail and air mail where necessary on December 21, 2011.

James R. Holbein, Secretary
U.S. International Trade Commission
500 E Street, SW, Room 112A
Washington, DC 20436

FOR COMPLAINANT HTC CORP:

Thomas L. Jarvis, Esq.
FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER, LLP
901 New York Avenue, NW
Washington, DC 20001

FOR RESPONDENTS APPLE INC., a/k/a APPLE COMPUTER, INC.:

V. James Adduci, II, Esq.
ADUCI, MASTRIANI & SCHAUMBERG, L.L.P.
1200 Seventeenth Street, NW
Fifth Floor
Washington, DC 20036
IN THE MATTER OF CERTAIN PORTABLE ELECTRONIC DEVICES AND RELATED SOFTWARE 337-TA-721

PUBLIC MAILING LIST

Heather Hall
LEXIS - NEXIS
9443 Springboro Pike
Miamisburg, OH 45342

Kenneth Clair
THOMSON WEST
1100 – 13th Street NW
Suite 200
Washington, DC 20005

( ) Via Hand Delivery
( ) Via Overnight Mail
( ) Via First Class Mail
( ) Other:___________

( ) Via Hand Delivery
( ) Via Overnight Mail
( ) Via First Class Mail
( ) Other:___________