# UNITED STATES INTERNATIONAL TRADE COMMISSION Washington, D.C. 20436

In the Matter of

CERTAIN ELECTRONIC DEVICES, INCLUDING WIRELESS COMMUNICATION DEVICES, PORTABLE MUSIC and DATA PROCESSING DEVICES, AND TABLET COMPUTERS

Investigation No. 337-TA-\_\_\_\_

## COMPLAINT UNDER SECTION 337 OF THE TARIFF ACT OF 1930, AS AMENDED

#### Complainants:

Samsung Electronics Co., Ltd. 416 Maetan-3dong, Yeongtong-gu Suwon-City, Gyeonggi-do, Korea 443-742 Telephone: 011-82-31-200-1114

Samsung Telecommunications America, LLC 1301 East Lookout Drive Richardson, Texas 75082 Telephone: 972-761-7000

#### **Counsel for Complainants:**

Charles K. Verhoeven Quinn Emanuel Urquhart & Sullivan LLP 50 California Street, 22nd Floor San Francisco, California 94111 Telephone: 415-875-6600

Kevin P.B. Johnson Victoria Maroulis Quinn Emanuel Urquhart & Sullivan LLP 555 Twin Dolphin Drive, 5th Floor Redwood Shores, California 94065 Telephone: 650-801-5000

#### Respondent:

Apple Inc.
1 Infinite Loop
Cupertino, California 95014
Telephone: 408-996-1010

William Price Quinn Emanuel Urquhart & Sullivan LLP 865 S. Figueroa St., 10th Floor Los Angeles, California 90017 Telephone: 213-443-3000

Charles F. Schill Steptoe & Johnson LLP 1330 Connecticut Avenue, NW Washington, DC 20036 Telephone: 202-429-8162

## **TABLE OF CONTENTS**

			<u>Page</u>	
I.	INTRODUCTION			
II.	THE	PARTIES	2	
	A.	Complainants	2	
	B.	Respondent	3	
III.	ACC	USED PRODUCTS AT ISSUE	3	
IV.		ASSERTED PATENTS AND NON-TECHNICAL DESCRIPTION OF ASSERTED PATENTS	4	
	A.	The '348 Patent	4	
	B.	The '644 Patent	7	
	C.	The '980 Patent	10	
	D.	The '843 Patent	11	
	E.	The '114 Patent	12	
	F.	Licenses	14	
V.		AWFUL AND UNFAIR ACTS OF RESPONDENT—PATENT UNGEMENT	14	
VI.	SPEC	CIFIC INSTANCES OF UNFAIR IMPORTATION AND SALE	16	
VII.		SSIFICATION OF THE INFRINGING PRODUCTS UNDER THE MONIZED TARIFF SCHEDULE	17	
VIII.	THE	DOMESTIC INDUSTRY RELATING TO THE ASSERTED PATENTS	17	
	A.	Samsung's Wireless Communication Devices Practice the Inventions of the Asserted Patents.	18	
	B.	Samsung Conducts Significant Activities in the United States Relating to the Technology of the Asserted Patents	18	
IX.	RELIEF REOUESTED			

## **EXHIBITS**

Exhibit	Description
1.	Certified Copy of U.S. Patent No. 7,706,348
2.	Certified Copy of U.S. Patent No. 7,486,644
3.	Certified Copy of U.S. Patent No. 6,771,980
4.	Certified Copy of U.S. Patent No. 6,879,843
5.	Certified Copy of U.S. Patent No. 7,450,114
6.	Intentionally left blank
7.	Certified Copy of Assignment of U.S. Patent No. 7,706,348 <sup>1</sup>
8.	Certified Copy of Assignment of U.S. Patent No. 7,486,644
9.	Certified Copy of Assignment of U.S. Patent No. 6,771,980
10.	Certified Copy of Assignment of U.S. Patent No. 6,879,843
11.	Certified Copy of Assignments of U.S. Patent No. 7,450,114
12.	Intentionally left blank
13.	Samsung 2009 Annual Report
14.	Claim Chart for Representative Independent Claims of U.S. Patent No. 7,706,348
15.	Claim Chart for Representative Independent Claims of U.S. Patent No. 7,486,644
16.	Claim Chart for Representative Independent Claims of U.S. Patent No. 6,771,980
17.	Claim Chart for Representative Independent Claims of U.S. Patent No. 6,879,843
18.	Claim Chart for Representative Independent Claims of U.S. Patent No. 7,450,114
19.	Intentionally left blank
20.	iPhone 4 Technical Specifications
21.	UMTS article from 3GPP
22.	3GPP Technical Specification TS 25.211 v.6.9.0
23.	iPhone 4 Teardown from www.tgdaily.com
24.	X-GOLD 616 Technical Specification
25.	HSPA article from 3GPP
26.	3GPP Technical Specification 25.212 v.6.9.0
27.	Multitasking Done the Right Way
28.	iPhone 4 Teardown from <u>www.ifixit.com</u>
29.	Apple iPhone iOS 4
30.	iPhone 4 – Safari
31.	iPhone 4 – Maps + Compass
32.	iPhone 4 – Phone
33.	Apple iOS Application Programming Guide
35.	Apple Technical Q&A iPhone User Guide for iOS 4.2 and 4.3 Software
36.	Apple iPhone 4 – Features
37.	Apple iOS Software Update
37.	Apple 105 Software Optiale

<sup>&</sup>lt;sup>1</sup> U.S. Patent No. 7,706,348 is a continuation of Application No. 09/611,069, which issued as U.S. Patent No. 6,882,636. The assignment of Application No. 09/611,069 includes an assignment of all rights in, among other things, continuations of the Application.

Exhibit	Description
38.	Apple – iPhone 4 – Learn about phone and voicemail features
39.	Apple – iPhone 4 – See how the iPhone Multi-Touch keyboard works
40.	Apple – iPhone 4 – Play music and video with the built-in iPod
41.	Apple – iPhone 4 – Design of the Display
42.	iOS Application Programming Guide
43.	iOS Human Interface Guidelines
44.	Scroll View Programming Guide for iOS
45.	"GestureDectector.OnGestureListener," available at
	http://developer.android.com/reference/android/view/GestureDetector.OnGestureListener.html
46.	Apple Publications Style Guide (December 2009)
47.	"ScrollView," available at
	http://developer.android.com/reference/android/widget/ScrollView.html
48.	"Galaxy S 4G Android Smartphone," available at http://www.samsung.com/us/mobile/cell-
	phones/SGH-T959HABTMB
49.	Relevant Pages from 3GPP TS 25.331 v6.9.0
50.	Galaxy S 4G Information Guide
51.	Samsung Galaxy S," available at
	http://www.samsung.com/global/microsite/galaxys/specification/spec.html?index=3&ver=hi
52.	"Android Developer's Guide," available at http://developer.android.com/guide/index.html
53.	Samsung Galaxy S 4G T959V User Manual
54.	"Samsung Galaxy S 4G," available at http://www.t-mobile.com/shop/Phones/cell-phone-
	detail.aspx?cell-phone= Samsung-Galaxy-S-4G&cm_mmc_o=
	Vzbp%20mwzygtCjCVAygtzlwCjC7wEwybgCjCW/-
55.	"Handling UI Events," available at <a "http:="" developer.android.com="" developer.android.com<="" guide="" href="http://developer.android.com/guide/topics/ui/ui- " http:="" td="" toper.android.com="" topics="" ui="" ui-=""></a>
56.	events.html "Maties French" and the state of
30.	"MotionEvent," available at http://developer.android.com/reference/android/view/MotionEvent.html
57.	THOR M5730 Technical Specification
58.	"Teardown of the Samsung Galaxy S 4G smart phone" from www.chipworks.com
59.	"Gestures" Android Developer's Forum
60.	Apple Retail Store List
61.	Foreign Patents or Patent Applications Corresponding to the Asserted Patents
62.	Identification of Entities with Current License Agreements under Asserted Patents and
	Entities with Current Agreements Containing a Covenant-Not-To-Sue or Non-Assertion
	Clause With Respect to Asserted Patents (Confidential)
63.	Apple's 2010 Annual Report
64.	Purchase receipt for the iPhone 4, Serial Number TC1134SSA4S and iPod Touch 8G (4th
65	GEN), Serial Number C3RFFUJHDCP7
65. 66.	Order Acknowledgement for the iPad 2 Wi-Fi 3G 16GB, Serial No. DN6FM2UUDFJ1  Photographs of the accused iPhone 4 iPad Toych 8G (4th GEN), and iPad 2 Wi Fi 3G 16GB
	Photographs of the accused iPhone 4, iPod Touch 8G (4th GEN), and iPad 2 Wi-Fi 3G 16GB iPod Touch User Guide for iOS 4.3 Software
67.	
68. 69.	iPad User Guide for iOS 4.3 Software  Domestic Industry Claim Chart for Representative Claim of U.S. Patent No. 7,706,348
70.	
70.	Domestic Industry Claim Chart for Representative Claim of U.S. Patent No. 7,486,644

Exhibit	Description
71.	Domestic Industry Claim Chart for Representative Claim of U.S. Patent No. 6,771,980
72.	Domestic Industry Claim Chart for Representative Claim of U.S. Patent No. 6,879,843
73.	Domestic Industry Claim Chart for Representative Claim of U.S. Patent No. 7,450,114
74.	Intentionally left blank
75.	Photographs of the Samsung Galaxy S 4G T959V
76.	Declaration Regarding Samsung's Domestic Industry (Confidential)

## **APPENDICES**

	Description
A	Certified Copy of the Prosecution History of U.S. Patent No. 7,706,348
В	Certified Copy of the Prosecution History of U.S. Patent No. 7,486,644
C	Certified Copy of the Prosecution History of U.S. Patent No. 6,771,980
D	Certified Copy of the Prosecution History of U.S. Patent No. 6,879,843
Е	Certified Copy of the Prosecution History of U.S. Patent No. 7,450,114
F	Intentionally left blank
G	Technical References Cited in the Prosecution History of U.S. Patent No.
	7,706,348
Н	Technical References Cited in the Prosecution History of U.S. Patent No.
	7,486,644
I	Technical References Cited in the Prosecution History of U.S. Patent No.
	6,771,980
J	Technical References Cited in the Prosecution History of U.S. Patent No.
	6,879,843
K	Technical References Cited in the Prosecution History of U.S. Patent No.
	7,450,114

#### I. INTRODUCTION

- 1. Samsung Electronics Co., Ltd. ("SEC") and Samsung Telecommunications

  America, LLC ("STA") (collectively, "Complainants" or "Samsung") respectfully request that
  the United States International Trade Commission ("Commission") institute an investigation into
  violations of Section 337 of the Tariff Act of 1930, as amended, 19 U.S.C. § 1337 ("Section
  337").
- 2. Apple Inc. ("Apple" or "Respondent") has engaged in unfair acts in violation of Section 337 through unlawful and unauthorized importation, sale for importation into the United States, and/or the sale within the United States after importation, of certain electronic devices, including wireless communication devices, portable music and data processing devices, and tablet computers (hereinafter collectively "the Accused Products") that infringe one or more claims of United States Patent Nos. 7,706,348 ("the '348 Patent"), 7,486,644 ("the '644 Patent"), 6,771,980 ("the '980 Patent"), 6,879,843 ("the '843 Patent"), and 7,450,114 ("the '114 Patent") (collectively "the Asserted Patents").
- 3. Specifically, Samsung asserts that the Accused Products directly or indirectly infringe at least claims 75-78 and 82-84 of the '348 Patent, claims 9-16 of the '644 Patent, claims 5, 6, 7, 9, and 10-13 of the '980 Patent, claims 1-11 of the '843 Patent, and claims 1-5 of the '114 Patent (collectively, "the Asserted Claims").
- 4. Certified copies of the Asserted Patents accompany this Complaint as **Exhibits 1-5**. SEC owns by assignment the entire right, title and interest to each of these patents. Certified copies of recorded assignments of the Asserted Patents accompany this Complaint as **Exhibits 7-11**.
- 5. As required by 19 U.S.C. §§ 1337(a)(2) and (3), an industry exists or is in the process of being established in the United States relating to the Asserted Patents and/or articles protected by

the Asserted Patents. Samsung has made significant investments in plant, equipment, and employment of labor and capital in the United States related to articles protected by the Asserted Patents through, among others, testing, service, warranty, repair, quality control, packaging, distribution, sales and marketing. Further, Samsung has made substantial domestic investment in the exploitation of the patents through, *inter alia*, research and development.

6. Samsung seeks relief from the Commission in the form of a permanent exclusion order, pursuant to Section 337(d), prohibiting entry into the United States of all Respondent's imported electronic devices, including wireless communication devices, portable music and data processing devices, and tablet computers that are covered by one or more claims of the Asserted Claims. Samsung further seeks a permanent cease and desist order, pursuant to Section 337(f), prohibiting Respondent, its subsidiaries, related companies and agents from engaging in the importation, marketing and/or advertising, distribution, offering for sale, or sale of the Accused Products that infringe one or more claims of the Asserted Claims.

#### II. THE PARTIES

#### A. Complainants

- 7. SEC is a corporation organized under the laws of Korea, with its principal place of business at 416 Maetan-3dong, Yeongtong-gu, Suwon-City, Gyeonggi-do, Korea 443-742.
- 8. STA is a limited liability company organized under the laws of Delaware, with its principal place of business at 1301 East Lookout Drive, Richardson, Texas 75082.
- 9. Samsung is in the business of designing, developing and marketing a wide range of products. Founded in 1969, SEC has grown to become a world leader in the design, manufacture and marketing of a wide variety of electronic products, ranging from innovative consumer electronics to semiconductors. SEC is one of the largest manufacturers of wireless communication devices in the world and has long focused on the United States as a critical

market for its products. In 1996, STA was established to engage in activities in the United States relating to wireless communications devices. As a result of consistent investment in design, research, development, testing, customer service, packaging, distribution, sales and marketing of its mobile telephones, Samsung is the number one provider by volume of mobile devices in the United States.

10. Additional information concerning Samsung can be obtained from its 2009 Annual Report, which accompanies this Complaint as **Exhibit 13**.

## B. Respondent

- 11. Respondent Apple Inc. is a corporation organized under the laws of California and has its principal place of business at 1 Infinite Loop, Cupertino, California 95014.
- 12. Respondent imports, markets, and sells within the United States electronic devices, including wireless communication devices, portable music and data processing devices, and tablet computers. Respondent has facilities around the world, including retail stores in the United States to directly sell the Accused Products to end users. *See* Exhibit 60 (Apple Retail Store List).

#### III. ACCUSED PRODUCTS AT ISSUE

- 13. The Accused Products are electronic devices that allow for communications and data transfer over networks including establishing data connections, execution of user operations and audio play back of digital data.
- 14. The accused wireless communication devices include, but are not limited to, the Apple iPhone 3G, the Apple iPhone 3GS, and the Apple iPhone 4 that infringe at least claims 75-

3

78 and 82-84 of the '348 Patent, claims 9-16 of the '644 Patent, claims 5, 6, 7, 9, and 10-13 of the '980 Patent, claims 1-11 of the '843 Patent, and claims 1-5 of the '114 Patent.<sup>2</sup>

- 15. The accused portable music and data processing devices include, but are not limited to, the iPod Touch, that infringe at least claims 1-5 of the '114 Patent.
- 16. The accused tablet computers include, but are not limited to, the iPad, the iPad 3G, the iPad 2, and the iPad 2 3G, that infringe at least claims 1-5 of the '114 Patent. The iPad 3G and the iPad 2 3G also infringe at least claims 75-78 and 82-84 of the '348 Patent and claims 9-16 of the '644 Patent.

## IV. THE ASSERTED PATENTS AND NON-TECHNICAL DESCRIPTION OF THE ASSERTED PATENTS<sup>3</sup>

#### A. The '348 Patent

## 1. Identification and Ownership of the Patent

17. SEC owns by assignment the entire right, title and interest in United States Patent No. 7,706,348, titled "Apparatus and Method for Encoding/Decoding Transport Format Combination Indicator in CDMA Mobile Communication System," which issued on April 27, 2010, naming Jae-Yoel Kim and Hee-Won Kang as inventors. A certified copy of the '348

<sup>&</sup>lt;sup>2</sup> The products enumerated in Paragraphs 14-16 are merely illustrative of the types and classes of infringing products that Respondent manufactures and imports into the United States, sells for importation into the United States, and/or sells within the United States after importation in violation of Section 337. Discovery may reveal that additional claims are infringed by the Accused Products and/or that additional products and product categories infringe the Asserted Claims.

<sup>&</sup>lt;sup>3</sup> All non-technical descriptions of the inventions herein are presented to provide a general background of those inventions. These statements are not intended to be used nor should they be used for purposes of patent claim interpretation. Complainants present these statements subject to and without waiver of their right to propose claim constructions based on applicable claim interpretation jurisprudence and relevant intrinsic and extrinsic evidence.

Patent is attached as **Exhibit 1**; a certified copy of the recorded assignment from the named inventors to SEC is attached as **Exhibit 7**.

18. Pursuant to Rule 210.12(c) of the Commission's Rules of Practice and Procedure, this Complaint is accompanied by the following: (1) a certified copy and three additional copies of the prosecution history of the '348 Patent (**Appendix A**); and (2) four copies of each reference document mentioned in the prosecution history (**Appendix G**).

### 2. Non-Technical Description of the Patented Invention

- 19. The '348 Patent is generally related to, among other things, third generation ("3G") wireless technology and the ability to simultaneously transmit multiple services. UMTS is a 3G wireless technology, the standards of which are created and governed by the Third Generation Partnership Project ("3GPP"). *See* Exhibit 21. Because interoperability is very important for communication devices, most cell phones sold in the U.S. comply with either the 3GPP/UMTS standards or a corresponding 3GPP2 standard. The '348 patent is related to a feature found in UMTS.
- 20. Within the UMTS, there is use of a transport-format combination indicator ("TFCI"). The TFCI is critical for the transmission of several simultaneous services, as it contains information about the transmission rates of each service. Because the TFCI is so critical, the TFCI bits are encoded using an error-correction code. This encoding protects the TFCI bits from any errors that may occur during the wireless transmission of the information. The '348 Patent discloses the encoding apparatus within the wireless communication system for the encoding of the TFCI information.

## 3. Foreign Counterparts to the '348 Patent

21. Pursuant to Commission Rule 210.12(a)(9)(v), **Exhibit 61** identifies the foreign patents or patent applications corresponding to the '348 Patent. No other patent or patent application has been issued, withdrawn, abandoned, rejected, or remains pending.

#### 4. Prior Litigation involving the '348 Patent

- 22. The '348 Patent has not been the subject of previous litigation in any domestic court or agency.
- 23. The '348 Patent is a continuation of Application No. 09/611,069, filed on July 6, 2000, which issued as U.S. Patent No. 6,882,636 ("the '636 Patent"). The '636 Patent has been the subject of previous litigation.
- 24. On June 2, 2006, Samsung filed a Complaint with the U.S. International Trade Commission to commence an investigation based on, *inter alia*, the alleged infringement of the '636 Patent by Respondents Ericsson, Inc., Telefonaktiebolaget LM Ericsson, Sony Ericsson Mobile Communications AB, and Sony Ericsson Mobile Communications (USA) Inc. (collectively, the "Ericsson Entities"). The investigation, *Certain Wireless Communication Equipment, Articles Therein, and Products Containing the Same*, Inv. No. 337-TA-577, was concluded in August 2007 pursuant to a settlement agreement between the parties.
- 25. On February 20, 2006, the Ericsson Entities filed a Complaint for patent infringement and request for declaratory judgment against SEC, STA, and Samsung Electronics America, Inc. ("SEA") in the United States District Court for the Eastern District of Texas (Case No. 06-cv-00063-TJW). On May 15, 2006, SEC, STA, SEA filed Counterclaims alleging infringement of the '636 Patent by the Ericsson Entities. On December 7, 2006, the Court stayed the proceedings with respect to the patents pending in ITC Inv. No. 337-TA-577, including the

6

'636 Patent. In July 2007, the action was dismissed without prejudice based on a settlement agreement between the parties.

- 26. The '636 Patent has not been the subject of any other litigation in any domestic court or agency.
- 27. On May 16, 2006, Samsung Electronics GmbH, Germany ("SEG") filed an action in Germany against Sony Ericsson Mobile Communications International AB, alleging infringement of six patents, including European Patent No. 1188269, the foreign counterpart of the '348 Patent. The action concluded in May 2007 before trial, based on a settlement between the parties. On May 16, 2006, SEC filed two actions in the United Kingdom alleging infringement of European Patent No. 1188269, one action against Sony Ericsson Mobile Communications AB and Sony Ericsson Mobile Communications International AB, and the other action against Telefonaktiebolaget LM Ericsson and Ericsson Limited. Both of these actions were settled by a consent order issued on July 25, 2007. SEC also filed an action in June 2006 in the Netherlands, alleging infringement by Sony Ericsson Mobile Communications International AB of European Patent No. 1188269. The action concluded in July 2007 based on a settlement between the parties. On April 21, 2011, Samsung Electronics GmbH filed an action in Germany, alleging infringement by Apple Inc. and Apple GmbH of European Patent No. 1188269. This action is ongoing. There has been no other foreign court or agency litigation involving the '348 Patent or any of its counterparts.

#### B. The '644 Patent

#### 1. Identification and Ownership of the Patent

28. SEC owns by assignment the entire right, title and interest in United States Patent No. 7,486,644, titled "Method and Apparatus for Transmitting and Receiving Data With High Reliability In a Mobile Communication System Supporting Packet Data Transmission," which

7

issued on February 3, 2009, naming Young-Bum Kim, Yujian Zhang, Ju-Ho Lee, Yong-Jun Kwak, Youn-Hyoung Heo, and Joon-Young Cho as inventors. A certified copy of the '644 Patent is attached as **Exhibit 2**; a certified copy of the recorded assignment from the named inventors to SEC is attached as **Exhibit 8**.

29. Pursuant to Rule 210.12(c) of the Commission's Rules of Practice and Procedure, this Complaint is accompanied by the following: (1) a certified copy and three additional copies of the prosecution history of the '644 Patent (**Appendix B**); and (2) four copies of each reference document mentioned in the prosecution history (**Appendix H**).

#### 2. Non-Technical Description of the Patented Invention

- 30. The '644 Patent also relates to the 3GPP/UMTS standards that govern many, if not most, cell phones sold in the U.S., as described above in the non-technical description of the '348 Patent. Certain parts of the UMTS specification (specifically, HSPA or High Speed Packet Access) describe the format of data packets used for high speed data transmission. The '644 Patent covers technology used to increase reliability of this data transmission. Data transmitted in a mobile communication system can be broken into two kinds: control information and user data. While it is undesirable to have errors in either type of data, ensuring accuracy of the control information is more important because it affects the overall function of the system. The '644 Patent describes technology to improve reliability of control information.
- 31. A commonly used technique to improve accuracy of data is to use error checking. In communication systems, data can be broken into data packets for transmission. Each data packet can have additional bits appended to allow the receiver to check for errors in the received data; one method of error-checking is called a cyclic redundancy check, or CRC. One technology that this patent claims is generating a cyclic redundancy check to be used for control information.

8

32. Three other concepts are important for understanding the '644 Patent. First, in mobile communication systems, such as for those involving mobile phones, data transmission from the base station to the mobile stations is called downlink data transmission while data transmission from the mobile stations to the base station is called uplink data transmission. The claims of the '644 Patent cover control information associated with uplink packet data transmission. Second, different techniques of encoding data require different amounts of overhead. For example, an encoding scheme that requires transmission of 3 bits for every data bit is known as a rate 1/3 code. While this scheme requires transmission of more bits than absolutely necessary, the additional bits added by the encoding scheme increase the reliability of the data. The claims of the '644 Patent require encoding or decoding at a coding rate of 1/3. Third, because data is transmitted in packets, a process called rate matching is needed in order match the number of bits to be transmitted to the number of bits available in a frame. This is typically done using repetition or removal (puncturing) of bits. The '644 Patent claims a specific pattern of bits be used for rate matching.

#### 3. Foreign Counterparts to the '644 Patent

33. Pursuant to Commission Rule 210.12(a)(9)(v), **Exhibit 61** identifies the foreign patents or patent applications corresponding to the '644 Patent. No other patent or patent application has been issued, withdrawn, abandoned, rejected, or remains pending.

#### 4. Prior Litigation involving the '644 Patent

34. The '644 Patent has not been the subject of previous litigation in any domestic court or agency. In addition, there has been no foreign court or agency litigation involving the '644 Patent or any of its counterparts.

9

#### C. The '980 Patent

#### 1. Identification and Ownership of the Patent

- 35. SEC owns by assignment the entire right, title and interest in United States Patent No. 6,771,980, titled "Method of Dialing in a Smart Phone," which issued on August 3, 2004, naming Jeong-Kyu Moon as inventor. A certified copy of the '980 Patent is attached as **Exhibit** 3; a certified copy of the recorded assignment from the named inventors to SEC is attached as **Exhibit** 9.
- 36. Pursuant to Rule 210.12(c) of the Commission's Rules of Practice and Procedure, this Complaint is accompanied by the following: (1) a certified copy and three additional copies of the prosecution history of the '980 Patent (**Appendix C**); and (2) four copies of each reference document mentioned in the prosecution history (**Appendix I**).

#### 2. Non-Technical Description of the Patented Invention

- 37. The '980 Patent is generally related to, among other things, integrating personal digital assistant ("PDA") functions (e.g., surfing the web) with mobile phone functions (e.g., dialing a number). Typically, a user viewing a telephone number in a PDA function, like a web browser, must memorize or record the telephone number in order to dial or store the number in an electronic phone book. PDA functions and mobile functions were handled by distinct parts of a smart phone and as such there was little integration or linking between the PDA part and the mobile phone part of the smart phone. Historically, PDA functionality (such as web browsing) was added to smart phones after mobile phone functionality (such as making a call). As a result, there was little or no integration between PDA functions and mobile phone functions.
- 38. The '980 Patent describes a way to integrate PDA functions and mobile phone functions running on the same device. When using a PDA function, a phone number may be selected and dialed from the PDA function. This ability greatly enhances the user's experience

of the PDA function by seamlessly integrating mobile phone functionality with PDA functionality. In addition, a user may avoid memorizing or writing down phone numbers displayed in the PDA function in order to dial or store the phone number using the mobile phone function.

## 3. Foreign Counterparts to the '980 Patent

39. Pursuant to Commission Rule 210.12(a)(9)(v), **Exhibit 61** identifies the foreign patents or patent applications corresponding to the '980 Patent. No other patent or patent application has been issued, withdrawn, abandoned, rejected, or remains pending.

#### 4. Prior Litigation involving the '980 Patent

40. The '980 Patent has not been the subject of previous litigation in any domestic court or agency. In addition, there has been no foreign court or agency litigation involving the '980 Patent or any of its counterparts.

#### D. The '843 Patent

#### 1. Identification and Ownership of the Patent

- 41. SEC owns by assignment the entire right, title and interest in United States Patent No. 6,879,843, titled "Device and Method For Storing and Reproducing Digital Audio Data in a Mobile Terminal," which issued on April 12, 2005, naming Dong-Woo Kim as inventor. A certified copy of the '843 Patent is attached as **Exhibit 4**; a certified copy of the recorded assignment from the named inventors to SEC is attached as **Exhibit 10**.
- 42. Pursuant to Rule 210.12(c) of the Commission's Rules of Practice and Procedure, this Complaint is accompanied by the following: (1) a certified copy and three additional copies of the prosecution history of the '843 Patent (**Appendix D**); and (2) four copies of each reference document mentioned in the prosecution history (**Appendix J**).

#### 2. Non-Technical Description of the Patented Invention

43. Modern mobile phones ("smart phones") often contain many features, including the ability to store and play digital audio data. In addition to mobile phone functionality, such phones typically have a keypad for inputting information to control the mobile phone and manipulate the digital audio data and a connector or adapter to connect them to a personal computer, which allows digital audio data to be downloaded from the personal computer to the mobile phone. When playing the digital audio data, the smart phone also allows the user to rewind or fast-forward the sounds produced. This patent claims a combined mobile phone with a digital audio data module for storing and playing digital audio data, such as MP3 data, that is downloaded from a personal computer using an adapter to a memory in the mobile phone.

#### 3. Foreign Counterparts to the '843 Patent

44. Pursuant to Commission Rule 210.12(a)(9)(v), **Exhibit 61** identifies the foreign patents or patent applications corresponding to the '843 Patent. No other patent or patent application has been issued, withdrawn, abandoned, rejected, or remains pending.

#### 4. Prior Litigation involving the '843 Patent

45. The '843 Patent has not been the subject of previous litigation in any domestic court or agency. In addition, there has been no foreign court or agency litigation involving the '843 Patent or any of its counterparts.

#### E. The '114 Patent

#### 1. Identification and Ownership of the Patent

46. SEC owns by assignment the entire right, title and interest in United States Patent No. 7,450,114, titled "User Interface Systems and Methods for Manipulating and Viewing Digital Documents," which issued on November 11, 2008, naming Majid Anwar as inventor. A certified copy of the '114 Patent is attached as **Exhibit 5**; certified copies of (a) the recorded

assignment from the named inventor to Picsel Technologies Limited, (b) the recorded change of name from Picsel Technologies Limited to Picsel (Research) Limited, executed on June 14, 2001, (c) the recorded assignment from Picsel (Research) Limited to SEC, executed on October 2, 2009, (d) the recorded correction of assignee's name, executed on October 8, 2009, are attached as **Exhibit 11.** 

47. Pursuant to Rule 210.12(c) of the Commission's Rules of Practice and Procedure, this Complaint is accompanied by the following: (1) a certified copy and three additional copies of the prosecution history of the '114 Patent (**Appendix E**); and (2) four copies of each reference document mentioned in the prosecution history (**Appendix K**).

#### 2. Non-Technical Description of the Patented Invention

- 48. The '114 Patent is generally related to, among other things, manipulating and viewing digital documents using a touch-sensitive display screen. For example, the '114 Patent describes a more facile way to manipulate content presented on a handheld or portable device. In prior systems, there was little or no ability to manipulate display documents on a handheld or portable device, particularly when the displayed documents included their own page layout or display structure. Native applications running on the handheld or portable device had limited or no capacity to manipulate displayed documents that were created or generated by other applications. The user therefore could not interact with displayed documents that included their own page layout or display structure. This limitation resulted in a rigid, unfriendly user interface that was unfamiliar with the way users interacted with tangible physical documents.
- 49. The '114 Patent describes a novel way to interact with electronic documents. The velocity of detected motion on the touch-sensitive display screen is detected and used to pan a displayed document at a rate based on the detected velocity. Sometimes, a page may be associated with a page inertia and used to render a series of pages of the documents at a rate

based on the detected velocity and the page inertia. The documents are associated with their own page structures that are representative of page layouts associated with the documents. These approaches greatly improve a user's interaction with displayed content on the handheld or portable device.

#### 3. Foreign Counterparts to the '114 Patent

50. Pursuant to Commission Rule 210.12(a)(9)(v), **Exhibit 61** identifies the foreign patents or patent applications corresponding to the '114 Patent. No other patent or patent application has been issued, withdrawn, abandoned, rejected, or remains pending.

#### 4. Prior Litigation involving the '114 Patent

51. The '114 Patent has not been the subject of previous litigation in any domestic court or agency. In addition, there has been no foreign court or agency litigation involving the '114 Patent or any of its counterparts.

#### F. Licenses

52. SEC has current license agreements under Asserted Patents and has current agreements containing a covenant-not-to-sue or non-assertion clause with respect to Asserted Patents with the entities identified in **Confidential Exhibit 62**.

# V. UNLAWFUL AND UNFAIR ACTS OF RESPONDENT—PATENT INFRINGEMENT

53. Respondent has engaged in unlawful and unfair acts including the sale for importation into the United States, importation into the United States, and/or sale within the United States after importation of the Accused Products that infringe one or more of the following claims: claims 75-78 and 82-84 of the '348 Patent, claims 9-16 of the '644 Patent, claims 5, 6, 7, 9, and 10-13 of the '980 Patent, claims 1-11 of the '843 Patent, and claims 1-5 of the '114 Patent.

14

- 54. Respondent has directly infringed and continues to directly infringe at least the Asserted Claims by, *inter alia*, its importation and sale of the Accused Products in the United States. In addition, Respondent also directly infringes the Asserted Claims by having its employees or agents operate, test, and/or demonstrate the Accused Products in the United States.
- 55. Respondent knows or has reason to know of the Asserted Patents through, *inter alia*, talks with Samsung. Nonetheless, Respondent has indirectly infringed and continues to indirectly infringe at least the Asserted Claims by inducing and/or contributing to infringement of the Asserted Patents.
- 56. Upon information and belief, Respondent actively induces others to infringe the Asserted Claims because it knows or has reason to know that selling the Accused Products together with Respondent-created user manuals, operating instructions and other materials will cause others to practice the Asserted Claims and actively and intentionally aids and abets that infringement. *See* Exhibits 20, 27, 30-36, 38-40, 44, 45, and 67-68.
- 57. Upon information and belief, Respondent further contributes to infringement because it sells the Accused Products knowing that they are not staple articles of commerce with substantial non-infringing uses, but rather are specially designed or adapted for use in the infringement of the Asserted Claims.
- 58. **Exhibit 14** is a claim chart that compares asserted independent claims 75 and 82 of the '348 Patent to a representative Accused Product. Documents referenced in this claim chart are attached as **Exhibits 20-24**, and 26.
- 59. **Exhibit 15** is a claim chart that compares asserted independent claims 9 and 13 of the '644 Patent to a representative Accused Product. Documents referenced in this claim chart are attached as **Exhibits 20, 25, 26, and 49**.

15

- 60. **Exhibit 16** is a claim chart that compares asserted independent claims 5 and 10 of the '980 Patent to a representative Accused Product. Documents referenced in this claim chart are attached as **Exhibits 20**, and 27-37.
- 61. **Exhibit 17** is a claim chart that compares asserted independent claims 1 and 4 of the '843 Patent to a representative Accused Product. Documents referenced in this claim chart are attached as **Exhibits 20**, and 35 40.
- 62. **Exhibit 18** is a claim chart that compares asserted independent claims 1 and 3 of the '114 Patent to a representative Accused Product. Documents referenced in this claim chart are attached as **Exhibits 20, 28, 33, 37, 41 44, and 46**.

#### VI. SPECIFIC INSTANCES OF UNFAIR IMPORTATION AND SALE

- 63. On information and belief, Respondent's Accused Products are manufactured outside the United States (*see* Exhibit 63 (Apple 2010 Annual Report at 8)). Thus Respondent, either by itself, through its subsidiaries, or through third-parties acting on its behalf, is engaged in the importation, sale for importation, and/or sale after importation into the United States of infringing electronic devices including wireless communication devices, portable music and data processing devices, and tablet computers.
- 64. Several of the Accused Products, including the iPhone 4, iPad 2 3G, and iPod Touch were purchased in the United States.<sup>4</sup>
- 65. On April 14, 2011, the iPhone 4 was purchased in the United States. (Exhibit 64.) Labels on the product and/or product packaging indicate that the product was assembled in China. (Exhibit 66.)

<sup>&</sup>lt;sup>4</sup> At the request of the Commission, Complainants will provide physical samples of the Accused Products.

- 66. On April 14, 2011, the iPod Touch was purchased in the United States. (**Exhibit** 64.) Labels on the product and/or product packaging indicate that the product was assembled in China. (**Exhibit 66**.)
- 67. On April 24, 2011, the iPad 2 3G was ordered in the United States. (**Exhibit 65**.) Labels on the product and/or product packaging indicate that the product was assembled in China. (**Exhibit 66**.)

## VII. CLASSIFICATION OF THE INFRINGING PRODUCTS UNDER THE HARMONIZED TARIFF SCHEDULE

68. Upon information and belief, the infringing Accused Products of Respondent may be classified under at least the following heading and subheading of the Harmonized Tariff Schedule of the United States ("HTSUS"): 8517.11.0000, 8517.12.0050, and 8443.31.0000, et seq. <sup>5</sup>

#### VIII. THE DOMESTIC INDUSTRY RELATING TO THE ASSERTED PATENTS

- 69. A domestic industry as required by 19 C.F.R. §§ 1337(a)(2) and (a)(3) relating to the Asserted Patents and articles protected by the Asserted Patents exists or is in the process of being established in the United States. *See* Confidential Exhibit 76. Each of the Asserted Patents is important to Samsung's success in the highly competitive industry of mobile electronic devices by providing Samsung with features that are highly desired to consumers.
- 70. Together, SEC and STA make substantial U.S. investments and expenditures in the exploitation of the Asserted Patents including, *inter alia*, design, research and development, and engineering, and significant U.S. investments and expenditures in plant, equipment, and employment of labor and capital related to articles protected by the Asserted Patents including,

<sup>&</sup>lt;sup>5</sup> These HTSUS numbers are based on Complainants' current knowledge. They are not intended to nor should they be interpreted to restrict the devices and products accused.

inter alia, testing, quality control, packaging, compliance, service, warranty, repair, distribution, sales and marketing. Confidential Exhibit 76 is a declaration regarding Samsung's domestic industry, detailing Samsung's significant domestic investments in plant and equipment, significant domestic employment of labor and capital, and substantial domestic investments in the exploitation of, or related to, the Asserted Patents and articles protected by the Asserted Patents. These domestic activities are likely to increase in the future as a result of Samsung's increasing U.S. sales of wireless communication devices, as well as Samsung's expansion of its product offerings in the U.S. market, such as its wireless computer tablets. See Confidential Exhibit 76.

- A. Samsung's Wireless Communication Devices Practice the Inventions of the Asserted Patents.
- 71. Claim charts demonstrating that a representative wireless communication device, the Samsung Galaxy S 4G T959V Smartphone, practices at least one independent claim of each Asserted Patent are attached as **Exhibits 69-74**. Documents referenced in these claim chart are attached as **Exhibits 21, 22, 25, 26, 45, and 47-59**. The Samsung Galaxy S 4G T959V Smartphone user manual, attached as **Exhibit 53**, provides further evidence that this representative product practices at least one of the claims of each of the Asserted Patents. Photographs of the Samsung Galaxy S 4G T959V Smartphone are attached as **Exhibit 75**.
  - B. Samsung Conducts Significant Activities in the United States Relating to the Technology of the Asserted Patents.
- 72. As detailed in **Confidential Exhibit 76**, STA engineers and other personnel located in the United States, are engaged in activities necessary to commercialize and support Samsung's wireless communications devices covered by the Asserted Patents and exploit the technologies claimed in the Asserted Patents. In addition, STA has made substantial investment in its research and development program that supports Samsung's wireless communications

devices covered by the Asserted Patents, including investments in its headquarters in Richardson, Texas and research facility in San Jose, California, as well as the employment of substantial engineering staff and the necessary equipment to support them. *Id.* STA invests in U.S.-based personnel who provide product design, research and development, and engineering to help design a product that will work in the U.S. market. *Id.* STA invests in U.S.-based personnel who provide product packaging, distribution, testing, compliance, quality control and technical marketing to create a market-ready product. *Id.* Finally STA invests in U.S.-based personnel who provide technical support, service, warranty and repair to Samsung customers in the U.S. who have purchased Samsung's wireless communication devices. *Id.* 

73. In addition to STA's headquarters in Richardson, Texas and research facility in San Jose, California, STA also has facilities related to Samsung's wireless communication devices that implicate features described in the Asserted Patents in Bridgewater, New Jersey; Atlanta, Georgia; Bellevue, Washington; Overland Park, Kansas; Plano, Texas; Coppel, Texas; and El Segundo, California.

#### IX. RELIEF REQUESTED

- 74. Complainants respectfully requests that the Commission:
  - (a) Institute an immediate investigation pursuant to Section 337 of the Tariff Act of 1930, as amended, 19 U.S.C. § 1337, with respect to Respondent's violations of that section arising from the importation into the United States, sale for importation, and/or the sale within the United States after importation of certain electronic devices, including wireless communication devices, portable music and data processing devices, and tablet computers that infringe one or more claims of United States Patent Nos. 7,706,348, 7,486,644, 6,771,980, 6,879,843, and 7,450,114;

- (b) Set a target date of no more than 15 months;
- (c) Schedule and conduct a hearing pursuant to Section 337(c) for the purposes of (i) receiving evidence and hearing argument concerning whether there has been a violation of Section 337, and (ii) following the hearing, determining that there has been a violation of Section 337;
- (d) Issue a permanent exclusion order directed to products manufactured by Respondent, its subsidiaries, related companies and agents pursuant to 19 U.S.C. § 1337(d) excluding entry into the United States of electronic devices, including wireless communication devices, portable music and data processing devices, and tablet computers that infringe one or more of claims 75-78 and 82-84 of the '348 Patent, claims 9-16 of the '644 Patent, claims 5, 6, 7, 9, and 10-13 of the '980 Patent, claims 1-11 of the '843 Patent, and claims 1-5 of the '114 Patent;
- (e) Issue a permanent cease and desist order pursuant to 19 U.S.C. § 1337(f) prohibiting Respondent, its subsidiaries, related companies and agents from engaging in the importation, marketing and/or advertising, distribution, offering for sale, sale, or sale after importation of electronic devices, including wireless communication devices, portable music and data processing devices, and tablet computers that infringe one or more of claims 75-78 and 82-84 of the '348 Patent, claims 9-16 of the '644 Patent, claims 5, 6, 7, 9, and 10-13 of the '980 Patent, claims 1-11 of the '843 Patent, and claims 1-5 of the '114 Patent;

- (f) Impose a bond upon importation of wireless communication devices, portable music and data processing devices, and tablet computers during the 60-day Presidential review period pursuant to 19 U.S.C. § 1337(j); and
- (g) Issue such other and further relief as the Commission deems just and proper under the law, based on the facts determined by the Investigation and the authority of the Commission.

DATED: June 28, 2011

Respectfully submitted,

Charles K. Verhoeven

Quinn Emanuel Urquhart & Sullivan LLP

50 California Street, 22nd Floor

San Francisco, CA 94111

Telephone: 415-875-6600

Kevin P.B. Johnson Victoria Maroulis

Quinn Emanuel Urquhart & Sullivan LLP

555 Twin Dolphin Drive, 5<sup>th</sup> Floor Redwood Shores, California 94065

Telephone: 650-801-5066

William Price

Quinn Emanuel Urquhart & Sullivan LLP

865 S. Figueroa St., 10th Floor Los Angeles, California 90017

Telephone: 213-443-3000

Charles F. Schill

Steptoe & Johnson LLP

1330 Connecticut Avenue, NW

Washington, DC 20036

Telephone: 202-429-8162