



MOBILE PATENT WARS: Apple: ~\$1.05 Billion – Samsung: \$0; Who is Next?



F. JASON FAR-HADIAN
Century IP Group

WHEN I MOVED TO CALIFORNIA IN 1989, one of my first jobs during college was to sell vehicle-mountable cellular phones, as they were called back then. The growing cell phone market in Southern California was dominated by a government-sanctioned duopoly where two companies—L.A. Cellular and Airtouch—were the only service providers, with rates of \$45 per month and 45 cents per minute for basic “analog” cellular service. The top cell phone manufacturers were Motorola, Panasonic and Mitsubishi. Nokia was a relatively obscure manufacturer in the U.S. market. Apple was selling Macintosh computers, Samsung was regrouping after the death of its founder, and the Internet, let alone the iPhone or the iPad, was far from reality.

With the introduction of new digital networks, which operate on a range of the radio spectrum auctioned off by the federal government in 1995, additional service providers such as Sprint PCS and PacBell entered the market in California. This led to increased competition and a substantial reduction in the cost of ownership of cellular phones, which by then were all truly mobile handheld devices. Motorola’s StarTAC clamshell phone became a breakthrough in design over the brick like handsets of the past when it was released in 1996. It was not until over ten years later, in 2007, that Apple entered the telecom market for the first time with the iPhone.

The iPhone’s claim to fame is that it was one of the first smartphones that sported a fully functional touchscreen user interface and virtual keyboard. Of course, the iPhone was not created in a

vacuum as it was an improvement over previously existing devices. Nevertheless, it remains undisputed that the iPhone is responsible for introducing and popularizing the mobile apps and the notion of an always-connected mobile device that was capable of providing features beyond the traditional Personal Digital Assistant (PDA) that was used for storing contact and calendar information. As such, the iPhone and its progeny (*i.e.*, the iPad) provided Apple with a guaranteed stronghold on the app market, until Google’s Android entered the market in late 2008. Due to its open source platform, Android was quickly embraced by handset manufacturers like Samsung as a means to design devices that would compete with the iPhone and the iPad.

Fierce competition often leads to legal battles. In the mobile handset market, patent infringement suits were not uncommon prior to 2008, but licensing campaigns were more prevalent and generally were the preferred vehicles that led to settlements, with parties negotiating over the size of the expected royalties. With the emergence of the Android-based smartphones in 2008 and smaller profit margins, due to competition, the push for gaining larger market share and the desire for barring competitors from entry into the market paved the way for what is now commonly referred to as the “mobile patent wars.” In other words, particularly in the case of Apple, the objective shifted from earning royalties to market control and domination, which meant that more battles would end up in the courtroom as opposed to being resolved in private conference rooms.

Referring to FIG. 1, in 2009, we saw the dawn of the early lawsuits among the major market players, such as Apple and Nokia, where Nokia initiated a legal action in the U.S. asserting ten patents against Apple, with Apple countering with thirteen patents asserted as a defensive measure, and Nokia upping the ante by asserting seven additional patents and initiating a proceeding before the International Trade Commission (ITC).¹

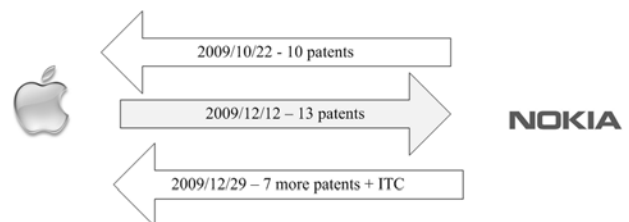


FIG. 1 - 2009



In 2010, as shown in FIG. 2, Apple unleashed patent infringement suits on several offensive fronts directed to Nokia and HTC and further took on Motorola, when Motorola, in a seemingly preemptive strike, sued Apple for infringing eighteen patents in the U.S. courts and the ITC, and also attempted to obtain a declaratory judgment that twelve of Apple's patents were invalid.

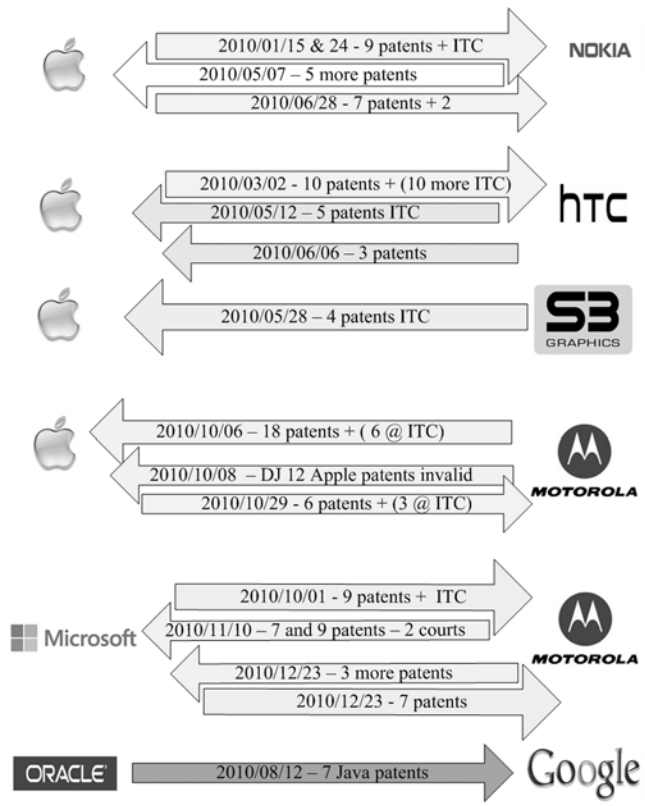


FIG. 2 - 2010

During the same year, other players in the mobile market, including Microsoft, Motorola, Oracle, Google and S3 Graphics (later acquired by HTC), filed patent infringement suits when privately held negotiations failed. The Microsoft and Motorola exchange involved the assertion of a total of twenty-five patents in various U.S. courts and the ITC. Oracle claimed that Google's Android operating system built on the Java open source platform infringed seven patents that Oracle owns as a result of acquiring Sun Microsystems. Aside from the lawsuits depicted in FIG. 2, other ancillary or independent actions were filed in 2010 in other jurisdictions, including in Europe and the Far East, the details of which remain outside the scope of this article.

Referring to FIG. 3, by 2011, despite Microsoft's assertion of additional patents against Motorola and a few others, Apple emerged as the dominant litigant in the industry, fighting on multiple fronts against Nokia, Samsung and HTC, among others. From top to bottom of this figure, in March 21, 2012, Apple scored a win in an ITC action brought by Nokia back in 2009. In spite of this win, only days

later, on March 25, Nokia asserted additional patents against Apple in a second ITC action. Apple managed to settle its disputes with Nokia on June 14, moving on to take a stand against Samsung in an epic battle, involving the assertion of seven utility patents and three design patents, as well as nine registered trademarks.

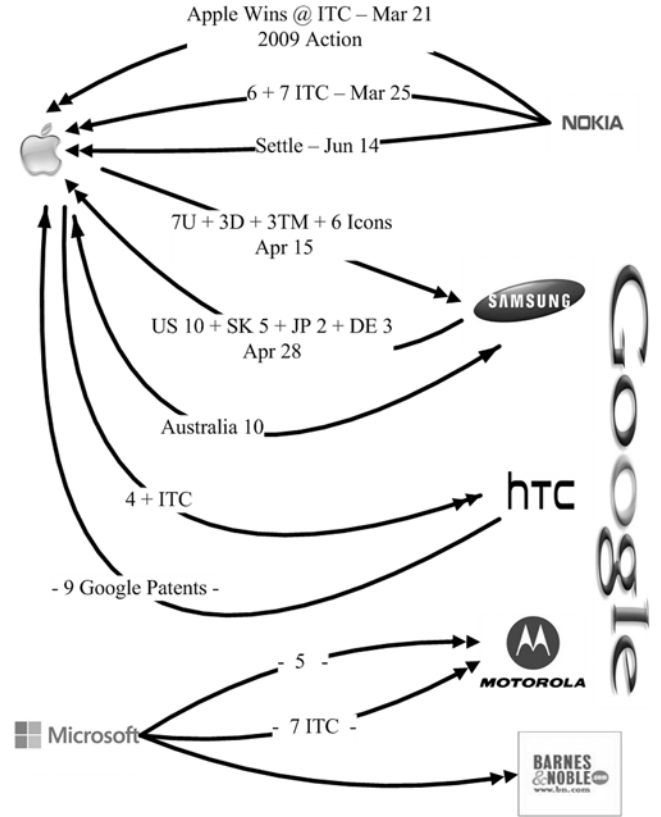


FIG. 3 - 2011

In a counteroffensive, on or about April 28, 2011, Samsung sued Apple in a number of countries for patent infringement, asserting ten patents in the United States, five in South Korea, two in Japan, three in Germany, and several in Australia. We will review, in more detail, the nature of some of the patents involved in the Apple v. Samsung battle. Before that, however, let us refer to FIGS. 3 and 4 to note that the year 2011 represented the culmination of acrimonious and fierce competition among the main players in the mobile handset market. On one side, Apple was on the offensive to drive Android-enabled devices off the market. On the other side, Google was busy adding to its war chest to protect the legitimacy of Android against Apple's current and future assaults.

Also, as shown in FIG. 3, in 2011 we saw for the first time an action brought by a handset manufacturer, namely HTC, against Apple for infringement of nine patents originally belonging to Google.² Referring to FIG. 4, also in 2011, Google was engaged in a series of high profile bids and acquisitions involving the purchase of thousands of patents. The first bid in June of 2011 was for the



acquisition of 6,000 Nortel patents, a bid which Google lost to a consortium of several companies, including Apple and Microsoft. In an overbid, the patents were sold to the consortium for \$4.5 billion, to the tune of \$750,000 per patent (on average, based on an even distribution).

Subsequently, Google went on to acquire over 2,000 patents from IBM in July and August for an undisclosed sum. Google also announced in August 2011 that it was going to acquire Motorola Mobility for \$12.5 billion, purportedly in an attempt to defend Android, using Motorola's patents in countersuits against Apple and Microsoft. As such, 2011 was a year that marked the continuation of significant adversity among the mobile phone market manufacturers, operators, and platform designers.



FIG. 4
2011 Patent Acquisitions

Referring to FIG. 5, the year 2012 so far has been the year in which a number of actions filed both in the U.S. and internationally have matured to verdict, while other actions remain pending and additional actions have been initiated. For example, earlier this year, Google was declared the prevailing party in a lawsuit against Oracle, where the court ordered Oracle to pay \$1 million to Google to cover expenses incurred by the work of a court-appointed expert. As to the war between Apple and Samsung, additional lawsuits were filed and are pending in Germany, Korea and the U.S. As a result, mixed results have been obtained in several courts, as provided in further detail in Figure 5 below.

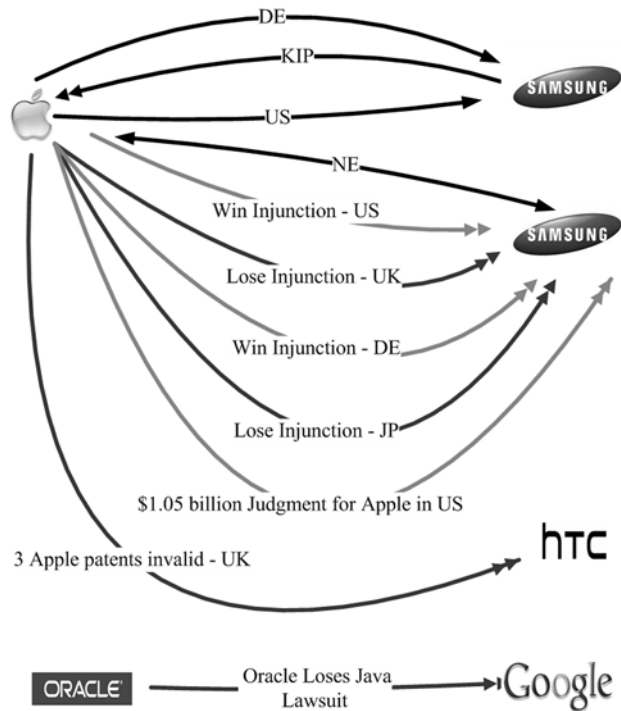


FIG. 5 - 2012

In the Netherlands, the courts managed to balance the rulings in several actions brought before them by Apple and Samsung, so that initially Apple obtained an injunction against Samsung, and a Hague civil court found that Samsung could not assert its essential patents against Apple due to a breach of fair, reasonable and non-discriminatory (FRAND) terms.³ Later, however, a Dutch appeals court overruled the lower civil court and held that Samsung's Galaxy devices did not infringe Apple's design claims.

In contrast, in the U.S., a federal court in California granted Apple's request for an injunction against Samsung's Galaxy tablet. But, in the UK, a British court held that Samsung's Galaxy tablets were not "cool" enough to be confused with Apple's iPad. Interestingly, a court in Germany barred sales of Samsung's Galaxy tablet, upholding Apple's claim of patent infringement. A court in Tokyo, Japan ruled that Samsung's mobile devices did not infringe on Apple's music synchronizing technology. Thus, a review of the litigation history between Apple and Samsung in 2011 and 2012 indicates a mixed result involving controversial and conflicting rulings, sometimes involving the same patents and accused devices.

After the above trail of inconsistent rulings and hard feelings involving Apple and Samsung, the most reverberated legal battle was fought in the San Jose courtroom of Federal Judge Lucy H. Koh in the Northern District of California. Apple sued Samsung on April 15, 2011 for patent and trademark infringement (*i.e.*, seven utility patents, three design patents, three registered trade dresses, and six trademarked icons) directed to Samsung's Galaxy line of mobile products, including the Galaxy S smartphone and the Galaxy Tab

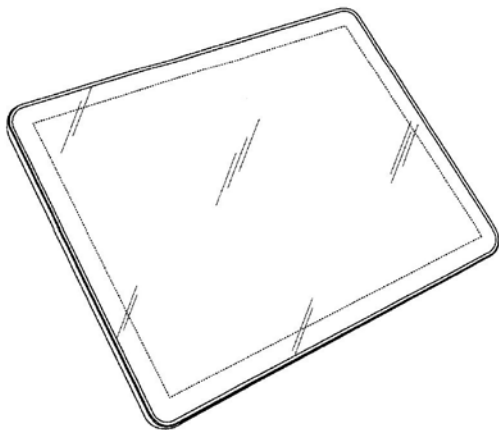


tablet.⁴ On June 16, 2011, Apple amended its complaint, dropping two utility patents and one design patent, and adding three new utility patents plus four trade dress claims covering the Samsung Galaxy Tab 10.1.

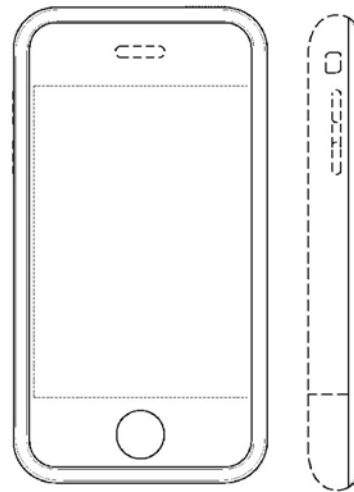
By the time the matter went to trial and the jury was selected on July 30, 2012, Apple’s amended complaint accused Samsung of infringing several of its trademarks and trade dresses, three of its utility patents (United States Patent Numbers 7,469,381, 7,844,915 and 7,864,163) and four of its design patents (United States Patent Numbers D504,889, D593,087, D618,677 and D604,305), and Samsung had countersued Apple, accusing Apple of infringing United States Patent Numbers 7,675,941, 7,447,516, 7,698,711, 7,577,460 and 7,456,893 granted to Samsung.

APPLE PATENTS

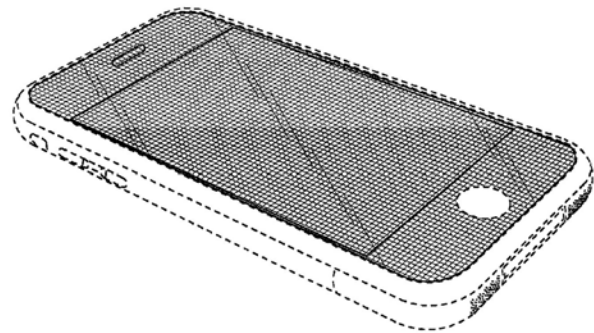
The D’889 patent is a design patent issued in 2005 and was at the heart of the dispute—it covers the ornamental design of an electronic device, accompanied by nine figures depicting a thin rectangular cuboid with rounded corners (*i.e.*, the iPad).



The D’087 patent is a design patent issued in 2009 that covers the ornamental design of an electronic device, accompanied by forty-eight figures depicting a thin and slimmer rectangular cuboid with rounded corners (*i.e.*, the iPhone).



The D’677 patent is a design patent issued in 2010 that covers the ornamental design of the iPhone, accompanied by eight figures depicting the iPhone with a grid like flat-surfaced touchscreen.



The D’305 patent is a design patent issued in 2009 that covers the ornamental design for a graphical user interface for a display screen (*i.e.*, the iPhone’s home screen).





The '163 patent is a utility patent issued in 2011 and is directed to certain interactive features of the iPhone or the iPad, wherein touching a displayed icon results in the rendering of the graphics of an app on the screen (i.e., the app opens responsive to the user selecting an icon in a way that the window containing the application is centered and the text in the window is aligned and displayed at least to a minimum text size. This patent also discloses the multi-touch to zoom technology).

The '381 patent is a utility patent issued in 2008 and is directed to interactive features of the iPhone or the iPad wherein pulling or pushing a virtual page displayed on the screen beyond the edge of the page results in the virtual page being displayed as moving off the screen and when the user removes his figure, the edge of the virtual page elastically rebounds to the edge of the display (i.e., the virtual page bounces back into place if moved beyond the limits of the display screen as if connect to the screen by a biasing member like a rubber band).

The '915 patent is a utility patent issued in 2010 and is directed to interactive features of the iPhone or the iPad wherein scrolling a virtual page displayed on the screen is monitored for its level and rate of displacement to calculate and generate a bounce back effect once the virtual page has moved beyond the edge of the page (i.e., the virtual page rebounds back into the screen at a certain rate and speed if scrolled beyond a limit).

SAMSUNG PATENTS

Patent numbers 7,675,941, 7,447,516, 7,698,711, 7,577,460 and 7,456,893, asserted by Samsung, were issued in the years 2008, 2009 and 2010. These patents are each directed to a different area of technology. This is in contrast to the asserted Apple patents, which are all directed to the useful features of the iPad or the iPhone as associated with the “look and feel” of the devices (both in functional and in aesthetic value). For example, one Samsung patent is directed to supporting an enhanced uplink communication scheme in which the gain factor for a transmission channel is scaled down if the total transmission power exceeds a threshold (the '516 patent). Another is directed to the efficient use of radio resources used for transmission of voice data in a packetized network (the '941 patent). Two others are related to a phone having a camera and features for image processing and image communication (the '893 and '460 patents). And the last one is directed to a feature that allows music playback when the user is manipulating a menu function (the '711 patent).

When comparing the patents asserted by Apple and Samsung, one noticeable aspect of the Samsung patents is the use of a variety of patent counsel for drafting patents and ultimately a recognizable difference in the quality and style with which each patent was drafted and prosecuted. For example, out of the five Samsung patents asserted, only two of them were drafted by the same law firm. One of the patents had issued with only a single claim. Several of the pat-

ents did not include claims that covered each of the three standard principal claim genres: (1) method, (2) system, and (3) computer program product claims. In contrast, Apple's utility patents were mostly drafted by two prominent patent firms and had a distinctly uniform style. Each patent had a good number of claims with claim scopes that covered all three claim genres allowing Apple to assert the claims with strength in both numbers and depth.

The above distinctions make one wonder if Apple's long-term strategy in building quality-focused patent portfolios using proficient patent counsel is at least a partial factor in Apple's success in the subject litigation. And, what about the strategy involved in the selection of the defendant, the forum of litigation, the timing of the lawsuit, and the presentation of the evidence? Would Apple have been as successful if it had challenged the Silicon Valley-based maker of Android—Google—in a lawsuit filed in California? After all, the Samsung phone features accused of infringement are all implemented as a part of the underlying Android operating system.

A review of the trial proceedings in the Apple v. Samsung litigation reveals that on many accounts, Apple's well-thought-out strategy before and during trial helped Apple advance its objectives and successfully communicate its story to the jury in order to effectively set the stage for a sweeping victory. Samsung, on the other hand, fell short. To better understand the details, it is useful to have an overview of the trial proceedings provided below.

On July 31, 2012, the day after the jury was selected, Apple immediately called Christopher Stringer (an Apple industrial designer) as well as Philip Schiller (the company's senior VP of worldwide marketing) as witnesses to personally interact with the jury and establish the pains and expenses Apple had to endure to invest and design the features which make the iPad and the iPhone leaders in mobile phone design.

Later, during the week of August 6, 2012, Apple's expert, Ravin Balakrishnan, a computer science professor at the University of Toronto, testified that he had analyzed twenty-one Samsung devices and concluded that all of them infringed Apple's so-called bounce back patents (i.e., the '381 and '915 patents), which let users know when they have scrolled to the edge of a virtual page by causing an elastic look and feel. He also pointed to Samsung documents in which the company criticizes its own phones for not having the feature, praised the iPhone, and labeled the deficiency in the Samsung devices as critical.

Apple also called Karan Sher Singh, another computer science professor at the University of Toronto, to testify that he similarly believed that Samsung copied the features covered in Apple utility patents (i.e., the '163 and '915 patents) directed to allowing users to scroll on a touch screen when using one finger, or zoom in or out by way of utilizing a multi-touch feature. Singh said that two dozen Samsung smart phones and tablets infringed the patents and showed videos of each one performing the actions.



On August 8, 2012, Apple succeeded in blocking testimony from a top Samsung executive (Dale Sohn) and one of its smartphone designers, because Samsung had repeatedly blocked access to the two witnesses and had explicitly stated that the two people had no relation to the accused products. Judge Koh ruled that “Samsung cannot now claim that Mr. Sohn has knowledge regarding Samsung’s technology and products after refusing for months to produce him for deposition. Samsung’s failure to disclose Mr. Sohn in its initial disclosures, or in any of its amended initial disclosures, precludes Samsung from now calling Mr. Sohn to testify.”

On August 13th, Terry Musika, Apple’s economic expert, testified that after Samsung began selling the allegedly infringing products Samsung’s share of the U.S. smartphone market rose dramatically to 22.7 million units in 2010. Musika contended that Samsung generated \$8.16 billion in revenue, according to the company’s own sales numbers, from the sale of the accused devices, including over one million tablets and twenty one million phones, generating \$644 million and \$7 billion in sales, respectively.

In its defense, Samsung called its experts, Michael Wagner (a former Pricewaterhouse Coopers executive), Vincent O’Brien (a former U.S. Justice Department economic analyst), and several other witnesses, in order to rebut the statements of Apple’s experts. Wagner testified that Musika failed to include the production and marketing costs of the allegedly infringing products in his calculation, resulting in an estimate of revenues that was allegedly inflated by 25%. O’Brien said Apple had spent over \$1.4 billion in patent royalties paid to various other companies, and that it is Apple who is indebted to Samsung for a reasonable royalty of \$22.8 million for the asserted patents. David Teece, a professor at the University of California at Berkeley, also testified that a reasonable royalty for Samsung’s standard-essential patents would be in the range of \$290 million to \$399 million under FRAND guidelines.

During a cross-examination exchange between a Samsung witness, Jin Soo Kim (a smartphone and tablet designer) and Harold McElhinny (one of Apple’s trial lawyers), Kim was asked whether it was true that during the conference between Samsung and Google it was suggested that Samsung’s tablet design “looked too much like the iPad.” Kim said he had no such knowledge, but that in preparing for his testimony, he had come across documents to that effect. Kim also said he has no information that Google ever asked Samsung to change the design of its tablet.

Samsung also called Dr. Tim Williams, an ex-Motorola scientist, as an expert witness to talk about Samsung’s high-speed data patents and how Apple allegedly infringes the essential patents. Williams said that he was paid \$550 per hour to testify on behalf of Samsung but claimed that he doesn’t need the money, and that he is testifying to help support a “strong U.S. patent system for [his] children.” Williams testified that Apple’s products infringe on Samsung’s cellular and data transmission patents. During cross-

examination, Williams conceded that, before he was contracted to testify on behalf of Samsung, he had not heard of some of the terms he used to define the reason for the alleged infringements. Also, his self-described altruism was also called into question, when it was revealed that Williams had made \$1 million per year for the past two years testifying as an expert witness against Apple.

In addition to the above-named high profile expert witnesses, a slew of other witnesses took the stand on behalf of Apple or Samsung, some as rebuttal witnesses. For example, Richard Donaldson, a former patent attorney for Texas Instruments Inc., testified on behalf of Samsung that Samsung had offered to license its patents to Apple in 2011 at a 2.4 percent discount, an offer that Apple apparently rejected. In reply, Janusz Ordober, an economics professor at New York University, testified for Apple that Samsung had failed to properly disclose the intellectual property rights claimed in the asserted essential patents to the European Telecommunications Standards Institute (ETSI), thereby waiving its rights to any royalties under those patents, due to the violation of ETSI disclosure requirements.

To support its allegation of trade dress infringement, Apple called a former employee and well-known graphic designer, Susan Kare, who testified that in her opinion, the accused Samsung’s screens and icons were illegal knockoffs of Apple designs. Kare went through screen after screen comparing Apple’s D’305 patent, which shows a screen with icons like those on the iPhone, with various user interface icons on Samsung devices. One after another, Kare testified that the Samsung icons and screens infringed Apple’s design patent and its trade dress, or the overall look and feel of the phone. Kare’s testimony came in opposition to that of Jeeyeun Wang, a Samsung designer, who had testified earlier that Samsung went to great lengths not to copy Apple’s icons or layouts.

Samsung, in an attempt to invalidate the design patents directed to the shape of the iPhone and the iPad, called Itay Sherman, an engineer and mobile technology consultant, who testified for Samsung that rectangular displays are the most common shape for such devices among all manufacturers, while rounded corners have significant utility for usability and economical reasons. Roger Fidler, an independent third-party witness unaffiliated with either party also testified that in the mid-1990s he was involved in developing tablet technology for Knight-Ridder Information Design Lab. He showed a mock-up of an early tablet design that featured a flat Plexiglas touch screen, much like the iPad. At that time, the technology was not fully developed to fully support the functional features of the design.

On August 15th, a few days prior to Samsung closing its case, Judge Koh once more suggested to the parties that resolving the matter outside the courtroom would result in a more predictable outcome for both sides and that they should reconsider settling the matter before taking a chance with having the jury decide their fate. Judge Koh also stayed a previous order that had denied Apple’s request to seal certain confidential financial data and proprietary



market research reports contained in certain trial exhibits. Apple later appealed that order for review to the U.S. Court of Appeals for the Federal Circuit. Samsung and Intel have in turn also filed similar appeals regarding sealing certain confidential information, including profit/loss statements.

On Friday, August 17, 2012, the trial proceedings were closed and on Tuesday, August 21, the case was handed to a jury of seven men and two women, as Judge Koh read to them a 109-page set of jury instructions. Three short days later, on August 24th, without asking any questions during deliberations, the jurors unanimously awarded Apple \$1.049 billion in damages, finding that Samsung had “willfully” infringed. A copy of the damages portion of the verdict is provided below.

It is noteworthy that Apple’s design patent D’889 for the ornamental features of the iPad was one of the few Apple patents that the jury concluded Samsung had not infringed. D’889 was deemed to be one of the most potent weapons in Apple’s arsenal against Samsung, particularly because Judge Koh on June 26, 2012 had granted Apple a preliminary injunction banning the sale of Samsung’s Galaxy Tab 10.1 over the D’889 patent. She was quoted as saying that the Galaxy Tab 10.1 is “virtually indistinguishable” from the claimed design in the D’889 patent. Moreover, against the expectations of many, the jury did not consider Samsung’s allegation regarding infringement of its essential patents sufficiently viable to award Samsung damages on any of its counter claims. The final results of the trial: Apple ~ \$1.05 billion, Samsung 0, with Samsung attorneys vowing to appeal.⁵

In the aftermath of the trial, Apple is to seek a preliminary and ultimately a permanent injunction on sale of eight of Samsung’s devices in the U.S. market. Samsung devices that are the targets of Apple’s request include the Galaxy S 4G, Galaxy S2 AT&T,

18
19
20
21
22
23
24

DAMAGES TO APPLE FROM SAMSUNG (IF APPLICABLE)

22. What is the total dollar amount that Apple is entitled to receive from Samsung on the claims on which you have ruled in favor of Apple?

\$ ~~1,051,855,000.00~~
\$ 1,049,393,540.00
9/24/12

The approximately \$1.05 billion award was a resounding and sweeping victory for Apple against the expectations of many. A review of the twenty page verdict form, that includes complex charts and multifaceted questions, reveals that the jury essentially found that (1) all asserted patents by both sides were valid, (2) Samsung had willfully infringed most of Apple’s design and utility patents, (3) Samsung had diluted Apple’s trade dress related to the iPhone, and (4) Apple had not infringed any of Samsung’s patents. The following excerpt from the verdict covers a good example of what the jury decided.

Galaxy S2 Skyrocket, Galaxy S2 T-Mobile, Galaxy S2 Epic 4G, Galaxy S Showcase, Droid Charge, and the Galaxy Prevail. Apple has noted that Samsung’s Galaxy Tab and Galaxy Tab 10.1 infringe three other patents besides the D’889 patent. However, Samsung contends that the preliminary injunction against sales of its Galaxy Tab 10.1 should be dissolved almost immediately, ahead of the normal fourteen-day response period.⁶

On August 27, 2012, Samsung appealed the verdict against it to the Court of Appeals for the Federal Circuit. Samsung contends that Judge Koh abused her discretion in denying Samsung the opportunity to introduce certain evidence that allegedly proves that Samsung smartphone designs were being prepared prior to Apple introducing the iPhone in 2007 and that such evidence would have shown the jury that Samsung did not or could not have copied Apple’s iPhone. Additional arguments on appeal may also cover the improper exclusion of certain prior art records that Samsung wanted to introduce, as well as an allegation that the jury’s surprisingly quick deliberations was a result of the jury not properly evaluating Samsung’s invalidity arguments.

For example, it has been suggested from certain statements⁷ made by the jury foreman, Velvin Hogan, in a post-trial interview, that he had led the other jurors in a direction which inappropriately influenced the outcome of the invalidity analysis. Another issue raised from one of the comments made by Hogan is whether the jury meant for the amount of the verdict to include punitive dam-

United States District Court
for the Northern District of California

Case5:11-cv-01846-LHK Document1931 Filed08/24/12 Page9 of 20

10. If you answered “Yes” to any of Questions 1 through 9, and thus found that any Samsung entity has infringed any Apple patent(s), has Apple proven by clear and convincing evidence that the Samsung entity’s infringement was willful?

(Please answer in each cell with a “Y” for “yes” (for Apple), or with an “N” for “no” (for Samsung).)

Apple Utility and Design Patents	Samsung Electronics Co., Ltd.	Samsung Electronics America, Inc.	Samsung Telecommunications America, LLC
'381 Patent (Claim 19)	Y	Y	Y
'915 Patent (Claim 8)	Y	Y	Y
'163 Patent (Claim 50)	Y	Y	Y
D'677 Patent	Y		Y
D'087 Patent	N		N
D'305 Patent	Y		Y
D'889 Patent	N	N	N

11. Has Samsung proven by clear and convincing evidence that Apple’s asserted utility and/or design patent claims are invalid?

'381 Patent (Claim 19)	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)
'915 Patent (Claim 8)	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)
'163 Patent (Claim 50)	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)
D'677 Patent	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)
D'087 Patent	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)
D'305 Patent	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)
D'889 Patent	Yes ___ (for Samsung)	No <input checked="" type="checkbox"/> (for Apple)



ages. Mr. Hogan in a post-trial interview stated: “[w]e wanted to make sure the message we sent was not just a slap on the wrist. We wanted to make sure it was sufficiently high to be painful, but not unreasonable.” For willful patent infringement, up to three times the amount assessed as real damages may be awarded by the judge, but not the jury. Accordingly, the award may be reduced or set aside on appeal if the jury in this case is shown to have inflated the damages award as a punitive measure.

In fairness, based on a review of the available transcripts and videos⁸ of post-trial statements made by the jury foreman, aside from a few troubling remarks, the remaining dialogue portrays a fairly ordinary group of jurors who did their best, considering their technical understanding and capabilities, to reach a fair result. True, they found the process complex and perhaps overbearing, nevertheless, they did follow the instructions as best as a layman group could have. Hogan has been repeatedly clear that the jurors were careful not to give Apple a home advantage, but the evidence was overwhelmingly favorable to Apple and it supported the allegations that Samsung knew about the design of the iPhone. For example, Hogan referred to internal Samsung emails and a meeting where Google representatives had warned Samsung that the designs were too close to the iPhone.⁹

It thus seems that the jurors thought that even if Samsung was telling the truth that it did not intend to copy Apple, at the very least, it deliberately chose not to take any affirmative steps to avoid a close reproduction of the iPhone design, once it became aware of the similarities. In other words, the jurors appreciated the fact that copying to an extent is not per se illegal, but felt that Samsung had crossed the line. Regardless of how the jurors reached their decision, Samsung will have a long and hard road ahead in appealing the results, as it will need to show juror misconduct or abuse of discretion by the judge. This is also not the end of Samsung’s troubles, as on August 31, 2012 Apple filed a new lawsuit in the U.S. asserting that seventeen more Samsung products violate Apple patents. The three major products identified in this lawsuit are the Galaxy S III, Verizon Galaxy S III, Galaxy Note and Galaxy Note 10.1.

So what do we take away from this story? First and foremost, the results of this trial highlight the value and potency that trade dress and design patents can have in the outcome of a patent infringement litigation. Design patents are generally underrated and it is not uncommon for patent attorneys to advise a client that a design patent has a very limited scope as defined by the submitted drawings in the patent application. While this is true, as we learned from Apple, if the design patents are properly bundled and asserted with other utility patents that cover the functional features of a close-knit family of products, then the chance of convincing a jury that the accused product was meant to copy the “look and feel” of the patented design is greater.

For example, Apple in this case accused Samsung of copying the iPhone’s design including the front speaker slot, uncluttered front

face, display borders, general grid layout, and the edge-to-edge glass. It also claimed that Samsung’s tablet infringed upon its design patents relating to the thin bezel, outer edge border, rounded corners, and edge-to-edge front glass. Under the “ordinary observer test” applicable to design patents, it was very easy for the jury to associate with the visually identifiable features of the claimed designs and find for Apple. In contrast, the jury had a difficult time appreciating the complex communication and data processing claims included in the asserted Samsung patents. There were reports that the jurors seemed bored or were inattentive when Samsung experts were discussing the intricate features of those patents.

As far as the future of the mobile market, Apple’s win would embolden it to initiate new lawsuits in jurisdictions and countries (*i.e.*, U.S. and Germany) in which Apple has enjoyed a record of success. Apple will likely succeed in enforcing long-term, if not permanent, bans on infringing Samsung products and also send a strong message to fend off other competitors in the U.S. and primary European markets. As these competitors will have to redesign around the known patented features, they will also need to spend time analyzing previously unasserted Apple patents or recently published patent applications that may be surfacing soon. These actions may limit or slow down the bandwidth with which these competitors can innovate and introduce new devices to the market.

The ultimate effect of Apple’s ability to carry a bigger stick in enforcing its IP rights, as a result of this verdict, will mean a potential continued increase in the market value of the company itself as Apple may be able to force its competitors to pay Apple royalties to incorporate certain desirable patented iPhone or iPad elements. Apple’s efforts for market domination, however, may not be as much of a threat as perceived. Cool functional features such as rubber banding or elastic scrolling are likely not so important to a user to the extent that it would dissuade him from purchasing a Samsung phone or tablet that does not sport such a feature. Apple fans will continue to buy Apple products for its cool innovative and arguably novel features, while non-Apple (*i.e.*, Android) fans may find it more sensible to continue purchasing competitors’ products that offer similar features or utilities without being exact or close copies.

The main question remains when or whether we will witness a head-on collision between the current two giants, Apple and Google. Apple has strategically avoided a direct battle with Google and has been smart in picking its fights. Will this win against Samsung put enough wind in its sails to boldly go against the other giant in the market? Does Apple have much to gain from a direct action against Google? Over the past few years, Google has been able to amass a substantial patent portfolio, which will allow it to go head-to-head with Apple in a long fought legal battle, a notion that would not be helpful to either party, or Apple in particular, as Google is a favorite homegrown company and is at least as much, if not more,



innovative than Apple. Regardless, a direct collision between Apple and Google may be inevitable if Android-based device manufacturers have agreements with Google to defend and indemnify them against infringement claims arising from the incorporation of Android in their devices.

In the short-term, Apple has won the fight, thanks to its long-term efforts in putting together an intellectual property portfolio that has withstood the test for validity before a jury and has helped Apple to effectively enforce its rights against a major competitor. In the long-term, the real winners seem to be a few select patent holding companies, with deep portfolios of patents in various technologies. Such companies have well-established and advanced licensing campaigns that generate royalty revenues that go directly to the bottom line. In this instance, those companies with an established portfolio of patents in the mobile technology area are sitting on the sidelines and continue to reap the benefits of their foresight in developing strong IP portfolios, by selling or licensing their IP assets at a large profit.¹⁰ ◀◀

The views expressed in this article are personal to the author and do not necessarily reflect the views of the author's firm, the State Bar of California, or any colleagues, organization, or client.

© 2012 Jason Far-hadian.

Jason Far-hadian is a shareholder at Century IP Group, an IP boutique with offices in Southern California servicing Fortune 100 corporations, midsize companies and startups, both domestically and worldwide. Jason is a registered U.S. patent attorney and is licensed to practice by the California State Bar. He primarily acts as legal counsel on topics related to technology licensing, patent prosecution, IP litigation and IP portfolio monetization and management. His technical expertise includes hardware and software, in general, and more specifically virtualized computing environments, wireless communications networks, complex verification systems, etc. He is a member of the Executive Committee of the State Bar of California, IP Section and the Bar's Social Media Task Force. He can be reached at jfarhadian@i-p-law.us.

Elise Diamond, JD and Ariana Santoro, a 2L at Chapman University School of Law, also contributed to this article.

Endnotes

1. The details illustrated in the enclosed figures is based on research of available information in the public record and the court docket, as well as publications on the Web and other resources, including news media, the USPTO database, and Wikipedia.org. The figures by no means comprehensively track or report all the lawsuits or proceedings that took place in the years 2009 through 2012 between the subject parties. The information included in this article is accurate as of September 10, 2012, when this article was finalized.

2. In June 2012, the International Trade Commission (ITC) rejected HTC's effort to assert patents it obtained from Google against Apple. Administrative Law Judge Thomas Pender apparently concluded that HTC failed to acquire all substantial rights in the relevant patents.
3. FRAND (sometimes referred to as FRAN) is a legal term that stands for "Fair, Reasonable, and Non-Discriminatory" and is typically used to describe licensing terms for technology that was accepted to become part of an approved technical standard by a standards body, where that technology is covered by a patent belonging to a member of the standards body. Such patents are generally referred to as "essential patents" meaning that the implementation or sale of a device that operates according to the related standard will essentially result in infringement of one or more claims in the patents. As such, a contributing member of a standards body is required to disclose any potentially essential patents, or patent applications, assigned to it and is also required to license those essential patents in a fair and non-discriminatory manner. For example, the Qualcomm's WCDMA patents make up part of the UMTS communications standards put together by the 3GPP standards body. Qualcomm as contributing member to the standard is required to offer a license to all phone manufacturers that make or desire to make UMTS-compatible phones under FRAND terms.
4. Apple asserted trademark/trade dress infringement based on both registered and unregistered elements, including dilution claims for allegedly "famous" elements.
5. Harold J. McElhinny, Michael A. Jacobs, Rachel Krevans, Jennifer Lee Taylor, Alison M. Tucher, Richard S.J. Hung and Jason R. Bartlett (Morrison & Foerster LLP) and William F. Lee and Mark D. Selwyn (WilmerHale) represented Apple, and Charles K. Verhoeven, Kevin P.B. Johnson, Victoria F. Maroulis, William Price, John Quinn and Michael T. Zeller (Quinn Emanuel Urquhart & Sullivan LLP) represented Samsung in this trial.
6. In a filing on August 26, 2012, Samsung requested that "the Court dissolve the preliminary injunction and retain the \$2.6 million bond posted by Apple pending a determination of damages suffered by Samsung as a result of the injunction."
7. "The software on the Apple side could not be placed into the processor on the prior art and vice versa. That means they are not interchangeable. That changed everything right there." Velvin Hogan. Hogan, a self-proclaimed inventor, also has made comments that lead one to believe that he managed to convince the other jurors that all the patents in question were deemed valid and as a result the jurors did not spend much time deliberating over the validity of the asserted claims, and skipped over to the infringement analysis.
8. Phil Nickinson, *Apple v. Samsung v. Apple jury foreman: 'It was very exciting*, AndroidCentral, Aug. 28, 2012, <http://www.androidcentral.com/apple-v-samsung-v-apple-jury-foreman-it-was-very-exciting>.
9. Apple produced evidence that Samsung's president sent an email saying that there was an enormous gap between Samsung's products and Apple's iPhone products and that Samsung should try to bridge that gap as much as possible. Below is a copy from the translated copy of the email, which was originally written in Korean:

MOBILE WARS continued on page 18



Endnotes

1. *Association for Molecular Pathology v. Myriad Genetics, Inc.*, 689 F.3d 1303 (Fed. Cir. 2012). Judge Lourie wrote the opinion for the court. Judge Moore joined the opinion for the court with respect to most issues but concurred in part, namely with respect to the patent eligibility of the claims to isolated DNA sequences. Judge Bryson concurred with respect to the patent eligibility of the claims to cDNA and methods but dissented with respect to the patent eligibility of the claims to isolated genes and gene fragments.
2. 653 F.3d 1329 (Fed. Cir. 2011) (Lourie, J.).
3. *Mayo Collaborative Services v. Prometheus Laboratories, Inc.*, 566 U.S. ____, 132 S. Ct. 1289, 182 L. Ed. 2d 321 (2012) (reversing a panel decision authored by Judge Lourie).
4. The BRCA1 and BRCA2 genes are referred to as the “breast cancer genes” (**BR**east **CA**ncer) because mutations in these genes correlate with an increased risk of breast cancer and ovarian cancer in women.
5. Plaintiffs filed a petition for *certiorari* on September 24, 2012, stating that the case raises three questions: (1) Are human genes patentable? (2) Did the court err in upholding a method claim “irreconcilable” with the ruling in *Mayo*? (3) Did the court err in holding that petitioners who are deterred by patents lack standing to challenge those patents absent evidence they have been personally threatened with an infringement suit?
6. Plaintiffs include the Association For Molecular Pathology, The American College Of Medical Genetics, The American Society For Clinical Pathology, The College Of American Pathologists, Haig Kazazian, M.D., Arupa Ganguly, Ph.D., Wendy Chung, M.D., Ph.D., Harry Ostrer, M.D., David Ledbetter, Ph.D., Stephen Warren, Ph.D., Ellen Matloff, M.S., Elsa Reich, M.S., Breast Cancer Action, Boston Women’s Health Book Collective, Lisbeth Ceriani, Runi Limary, Genae Girard, Patrice Fortune, Vicky Thomason, and Kathleen Raker.
7. 35 U.S.C. § 101 defines patentable subject matter: “[w]hoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefore, subject to the conditions and requirements of this title.”
8. *Myriad*, *supra* note 1, at 1321, n.8.
9. *Id.* at 1323, n. 7.
10. 450 U.S. 175 (1981).
11. 437 U.S. 584 (1978).
12. *Id.* at 590.
13. *Mayo*, *supra* note 3, at 1292.
14. *Mayo* at 1297 (framing the question presented as whether “the patent claims add *enough* to their statements of the correlations to allow the processes they describe to qualify as patent-eligible processes that *apply* natural laws?”).
15. *Myriad*, *supra* note 1, at 1340.
16. *Myriad*, *supra* note 1, at 1348.
17. *Id.* at 1325.
18. *Diamond v. Chakrabarty*, 444 U.S. 1028 (1980).
19. *Funk Bros. Seed Co. v. Kalo Inoculant Co.*, 333 U.S. 127 (1948).
20. *Myriad*, *supra* note 1, at 1348.
21. *Id.*
22. *Myriad*, *supra* note 1, at 1328 (citing *Parke-Davis & Co. v. H.K. Mulford Co.*, 189 F. 95, 103 (C.C.S.D.N.Y. 1911) (holding that adrenalin extracted from animal tissue is patentable although it differs from previous preparations only in its degree of purity from other portions of the tissue) and *Merck & Co. v. Olin Mathieson Chem. Corp.*, 253 F.2d 156, 161–64 (4th Cir. 1958) (holding that a purified composition of vitamin B-12 was patentable because the purification process resulted in a product that was therapeutically effective, whereas the natural form was not)).
23. Arguably, the combination of bacteria at issue in *Funk Bros.* may have been a combination that only occurred through human intervention in the form of selecting and combining particular elements, as noted by the dissent in that case. While the majority opinion emphasized the lack of inventiveness of claims to a composition of bacterial species that function exactly as nature provided, the concurrence by Justice Frankfurter cautions against suggesting that novel combinations that create useful inventions be excluded from patentability. For example, compare this statement from the majority: “[t]hey serve the ends nature originally provided and act quite independently of any effort of the patentee” with this from the concurrence: “[a]rguments drawn from such terms [“laws of nature” and “work of nature”] for ascertaining patentability could fairly be employed to challenge almost every patent.”

MOBILE WARS

continued from page 13

When everybody (both consumers and the industry) talk about UX, they weight it against the iPhone. The iPhone has become the standard. That’s how things are already.

Do you know how difficult the Omnia is to use? When you compare the 2007 version of the iPhone with our current Omnia, can you honestly say the Omnia is better? If you compare the UX with the iPhone, it’s a difference between Heaven and Earth.

Apple also introduced evidence that at a meeting between Google and Samsung, Google representatives warned Samsung executives to back away from copying Apple designs because Google thought Samsung’s products were getting too close.

10. See FIG. 4. While IBM does not have any products in the mobile platform space, IBM is among the top three companies, behind Samsung and Microsoft, with patents issued in that space, according to a study by Chetan Sharma Consulting in 2012.