# IN THE UNITED STATES DISTRICT COURT FOR THE EASTERN DISTRICT OF TEXAS MARSHALL DIVISION

| SIMPLEAIR, INC., | ş           |
|------------------|-------------|
| Plaintiff,       | ş           |
| v.               | Ş           |
| GOOGLE INC.      | Ş           |
| Defendant.       | ۶<br>۶<br>8 |

CASE NO. 2:11-CV-416-JRG

### MEMORANDUM OPINION AND ORDER

# I. INTRODUCTION AND BACKGROUND

Plaintiff SimpleAir, Inc. ("SimpleAir") filed this patent infringement action against Google on September 15, 2011. At trial, SimpleAir alleged that the operation of Google's Cloud Messenger (GCM) and Cloud to Device Messenger (C2DM) (collectively the "Accused Services") infringe independent claim 1, and dependent claims 2, 3, 7, and 22 (the "asserted claims") of U.S. Patent No. 7,035,914 (the "'914 Patent"). A jury trial commenced on January 13, 2014. On January 18, 2014, the jury reached and returned its unanimous verdict, finding that the Accused Services infringed each of the asserted claims, and that the asserted claims were not invalid (Dkt. No. 601).

Google moves the Court to overturn the jury's verdict and find that: (1) SimpleAir failed to offer sufficient evidence to permit a reasonable finder of fact to determine that Google infringed the asserted claims of the '914 Patent; or (2) Google has established that the asserted claims of the '914 Patent; or (2) Google has established that the asserted claims of the '914 Patent are obvious, and therefore invalid. *See* Google's Renewed Motions for Judgment as a Matter of Law (Dkt. Nos. 636 and 637, respectively). For the reasons stated below, Google's motions are **DENIED**.

### II. APPLICABLE LAW REGARDING RULE 50

Judgment as a matter of law (JMOL) is only appropriate when "a reasonable jury would not have a legally sufficient evidentiary basis to find for the party on that issue." Fed. R. Civ. P. 50(a). "The grant or denial of a motion for judgment as a matter of law is a procedural issue not unique to patent law, reviewed under the law of the regional circuit in which the appeal from the district court would usually lie." *Finisar Corp. v. DirectTV Group, Inc.*, 523 F.3d 1323, 1332 (Fed. Cir. 2008). The Fifth Circuit applies an "especially deferential" standard in reviewing a jury verdict. *Brown v. Bryan County*, 219 F.3d 450, 456 (5th Cir. 2000).

In deciding a motion under Rule 50(a), the Court reviews all evidence in the record and must draw all reasonable inferences in favor of the nonmoving party; moreover, the Court may not make credibility determinations or weigh the evidence, as those are solely functions of the jury. *Reeves v. Sanderson Plumbing Prods., Inc.,* 530 U.S. 133, 150-51 (2000). "A JMOL may only be granted when, 'viewing the evidence in the light most favorable to the verdict, the evidence points so strongly and overwhelmingly in favor of one party that the court believes that reasonable jurors could not arrive at any contrary conclusion." *Versata Software, Inc. v. SAP Am., Inc.,* 717 F.3d 1255, 1261 (Fed. Cir. 2013) (quoting *Dresser-Rand Co. v. Virtual Automation, Inc.,* 361 F.3d 831, 838 (5th Cir. 2004)).

#### **III. JUDGMENT OF INFRINGEMENT**

### A. Applicable Law Regarding Infringement

To prove infringement under 35 U.S.C. § 271, a plaintiff must show the presence of every element, or its equivalent, in the accused product or service. *Lemelson v. United States*, 752 F.2d 1538, 1551 (Fed. Cir. 1985). First, the claim must be construed to determine its scope and meaning; second, the construed claim must be compared to the accused device or service.

*Absolute Software, Inc. v. Stealth Signal, Inc.*, 659 F.3d 1121, 1129 (Fed. Cir. 2011) (citing Carroll Touch, *Inc. v. Electro Mech. Sys., Inc.*, 15 F.3d 1573, 1576 (Fed. Cir. 1993)). "A determination of infringement is a question of fact that is reviewed for substantial evidence when tried to a jury." *ACCO Brands, Inc. v. ABA Locks Mfr. Co.*, 501 F.3d 1307, 1311 (Fed. Cir. 2007).

#### B. The '914 Patent and Google's Motion

Claim 1 of the '914 Patent—the only independent claim asserted in this action—reads as follows:

A method for transmitting data to selected remote devices, comprising the steps of: transmitting data from an information source to a central broadcast server; preprocessing said data at said broadcast server, further comprising the step of: parsing said data with parsers corresponding to said central broadcast server; transmitting said data to an information gateway for building data blocks and assigning addresses to said data blocks; transmitting said data blocks from said information gateway to a transmission gateway for preparing said data block for transmission to receivers; transmitting preprocessed data to receivers communicating with said devices; and instantaneously notifying said devices of receipt of said preprocessed data whether said computing devices are online or offline from a data channel associated with each device.

'914 Patent, at 33:16-35. SimpleAir alleged that Google performed each of the limitations stated in claim 1, as well as certain additional limitations found in dependent claims 2, 3, 7 and 22. The jury agreed, rendering a unanimous verdict of infringement. Google challenges nearly every aspect of that verdict. First Google argues that SimpleAir did not present sufficient evidence that Google performs certain limitations of claim 1. Next, Google argues that SimpleAir failed to introduce sufficient evidence that Google meets the additional limitations found in the dependent claims. The Court will address Google's arguments with respect to each limitation in turn.

#### i. Transmitting data from an information source to a central broadcast server

The first disputed limitation in claim 1 of the '914 patent reads, "transmitting data from an information source to a central broadcast server." '914 Patent, at 33:18-19. The Court construed the term "information source" to mean "one or more content or online service providers that provide data to the central broadcast server, such as an online source of news, weather, sports, financial information, games, personal messages, or e-mails." Claim Construction Order, Dkt. No. 379, at 27-28. The Court construed the term "central broadcast server" to mean "one or more servers that are configured to receive data [from] a plurality of information sources and process the data prior to its transmission to one or more selected remote computing devices." *Id.* at 41.

SimpleAir presented three theories of infringement to the jury with respect to this limitation:

- Google performs this step when a Google application server sends data to the GCM [Google Cloud Messenger] FrontEnd server;
- (2) Google performs this step when the GCM FrontEnd server sends data from a Google or third party application server to the GCM BackEnd; and
- (3) Third party application servers perform this step when they send data to the GCM FrontEnd server, and their performance of this step is attributable to Google because Google controls and directs the entire GMC method.

Dkt. No. 694, at 7. SimpleAir's first two theories describe "first-party" conduct, where Google itself is acting to satisfy this "transmitting" limitation. SimpleAir's third theory involves the performance of the claimed step by a third-party, whose actions are allegedly attributable to Google. The Court must uphold the jury's verdict if substantial evidence supports any one of SimpleAir's theories. *i4i Ltd. P'ship v. Microsoft Corp.*, 598 F.3d 831, 850 (Fed. Cir. 2010) ("the verdict must be upheld if substantial evidence supports either legal theory").

#### 1. SimpleAir's theory No. 1

As a threshold matter, Google has conceded that this limitation is met under SimpleAir's first theory, when Google application servers send data to the GCM FrontEnd server. *See* Reply, Dkt. No. 730, at n.1. Moreover, both parties' experts testified that Google performs "transmitting data from an information source to a central broadcast server" when such first-party application servers (*e.g.* Gmail, Google Plus, or Google Hangout servers) transmit data from those servers to the GCM BackEnd. Dkt. No. 611 (1/13/2014 pm transcript (Knox)), at 115:7-23; Dkt. No. 612 (1/14/2014 am transcript (Knox)), at 9:9-11:14, 12:1-9; Dkt. No. 617 (1/15/2014 pm transcript (Williams)), at 177:4-12. This undisputed testimony provides substantial evidence supporting the jury's conclusion that Google meets this limitation under SimpleAir's first theory.

#### 2. SimpleAir's theory No. 2

With respect to SimpleAir's second theory of infringement, the parties dispute the construction of the "transmitting" limitation. Google argues that the "from" in "transmitting data *from* an information source to a central broadcast server" requires that the "information source" perform the sending of the data to the "central broadcast server." *See* Dkt. No. 636, at 11-12. Google accuses SimpleAir of attempting to rewrite the claim to read "transmitting data [taken] from an information source…" in order to claim infringement when data is sent from one portion of the central broadcast server to another portion of the central broadcast server. *See* Dkt. No. 730, at 4. SimpleAir counters that the "transmitting" limitation does not require that the information source perform the sending, merely that the data that is sent originate at the information source. *See* Dkt. No. 694, at 11 ("data *taken from* an information source is *from* that source") (emphasis in original).

During claim construction, Google and its then co-defendant Microsoft proposed the following construction of "central broadcast server":

one or more servers that receive data transmitted by a plurality of information sources and process the data prior to its transmission to one or more selected remote computing device[s].

Defendants' Responsive Claim Construction Brief, Dkt. No. 329, at 38. However, Google's argument with respect to the term was limited to whether or not a central broadcast server must actually receive data from information sources, as opposed to being "configured to receive" the same.

SimpleAir raised the issue of Google's proposed construction, and the "transmitted by" language that Google proposed in both its briefing and at the hearing. *See* Plaintiff's Opening Claims Construction Brief, Dkt. No. 302; Transcript of Claim Construction Hearing, Dkt. No. 378, at 135:25-138:1. However, Google effectively ignored the issue. At no point did Google argue that its proposed construction would include a limitation requiring the information source(s) to perform the sending of data. *See* Defendants' Responsive Claim Construction Brief, Dkt. No. 329, at 38. Similarly, counsel for Google made no argument at the claim construction hearing regarding such a requirement. *See* Transcript of Claim Construction Hearing, Dkt. No. 378, at 138-139.

Having been silent on this issue during claim construction, Google has waived its right to attack the Court's construction in a post-trial motion. *Lazare Kaplan Int'l, Inc. v. Photoscribe Techs., Inc.*, 628 F.3d 1359, 1376 (Fed. Cir. 2010) ("As we have repeatedly explained, litigants waive their right to present new claim construction disputes if they are raised for the first time after trial.") (internal citation omitted); *see also Versata Software, Inc. v. SAP Am., Inc.*, 717 F.3d 1255,

1262 (Fed. Cir. 2013) *cert. denied*, 134 S. Ct. 1013, 187 (2014) (holding that a defendant cannot mount a post-trial attack on a claim construction to which it had agreed).

Accordingly, whether "transmitting data from an information source to a central broadcast server" includes the transmission of data *taken from* said information source(s) becomes a purely factual issue. *Versata*, 717 F.3d at 1262. SimpleAir's expert, Dr. Knox, testified that (1) a Google server, the GCM FrontEnd, transmits data to a second Google server, the GCM BackEnd; and (2) that the data transmitted from the GCM FrontEnd constitutes data from an information source, *i.e.* data from a Google or third party application server. 1/13/2014 pm trial transcript, Dkt. No. 611, at 118:10-124:1; 131:15-133:6. Google's counsel cross examined Dr. Knox on this issue, closing with the comment, "we'll let the jury decide that." Dkt. No. 212 (1/14/2014 am trial transcript (Knox)) at 74:22-77:4. Ultimately, the jury chose to accept Dr. Knox's testimony and decided this issue in favor of SimpleAir. Google has not offered anything via this JMOL that would meet the high standard required to disregard the jury's finding of fact in this regard.

#### 3. SimpleAir's theory No. 3

SimpleAir's third and final theory of infringement for the first "transmitting" element is that Google is liable for infringement because it controls or directs the entire GCM process, and therefore the "transmitting data from an information source to a central broadcast server" by third wholly becomes attributable to Google. Because the Court has found that the jury's verdict is supported by substantial evidence of infringement under SimpleAir's first two theories, the Court does not address SimpleAir's third, "joint infringement" theory. *See i4i Ltd. P'ship*, 598 F.3d at 850 ("the verdict must be upheld if substantial evidence supports either legal theory").

# ii. preprocessing said data at said central broadcast server, further comprising the step of parsing said data with parsers

The parties dispute the proper reading of the second limitation in claim 1 of the '914. The relevant claim language reads:

preprocessing said data at said central broadcast server, further comprising the step of: parsing said data with parsers corresponding to said central broadcast server;

'914 Patent, at 33:20-23. Google argues that the above language describes two separate and distinct limitations: (1) preprocessing said data at said broadcast server; and (2) parsing said data with parsers. Dkt. No. 636, at 13-14. Google then argues that SimpleAir failed to provide sufficient evidence from which a reasonable jury could conclude that the Accused Services meet either limitation. *Id.* at 14-16. SimpleAir disputes Google's reading of the claim, arguing that parsing is a specific type of preprocessing sufficient to meet both steps set out in the claim, and that it introduced substantial evidence of such parsing. Dkt. No. 694, at 19-21. Alternatively, SimpleAir contends that it introduced evidence of preprocessing, other than parsing. *Id.* 19-20.

### 1. "Parsing" is sufficient to satisfy the claim language.

Again, the relevant claim requires the preprocessing of data at the central broadcast server, *"further* comprising the step of: parsing said data with parsers." '914 Patent, at 33:20-23 (emphasis added). According to Google, the use of the term "further" in the relevant claim language requires: (1) the preprocessing of data, *in addition to* (2) "parsing said data with parsers." Dkt. No. 636, at 13. Google failed to raise this argument during claim construction or at trial. Google is not permitted to raise it now, for the first time. See Lazare Kaplan Int'l, Inc., 628 F.3d at 1376.

Even if Google had not waived its challenge to the Court's construction, the Court is not persuaded that the claim requires two distinct steps of: "preprocessing" and "parsing." Rather,

the Court finds that various types of preprocessing (including parsing) satisfy the former, and that the latter further requires a specific type of preprocessing—namely, parsing. SimpleAir presented substantial evidence that the Accused Services "parse[] said data with parsers." *See* 1/13/2014 pm Trial Transcript, Dkt. No. 611, at 134:14-155:11; 147:8-149:19; Plaintiff's Exhibit ("PX") 115; PX 134. Such evidence is sufficient to support the jury's verdict that the Accused Services preprocess data as required by the asserted claims.

# 2. SimpleAir has introduced substantial evidence of other types of "preprocessing."

Although SimpleAir presented evidence of parsing sufficient to uphold the jury's verdict, SimpleAir has also presented evidence that Google performs preprocessing, other than parsing. For example, SimpleAir presented evidence that the GCM FrontEnd verifies the origin of GCM messages received from third parties before transmitting them to the GCM BackEnd. *See* 1/15/2014 pm Trial Transcript, Dkt. No. 617, at 27:12-21; PX 115 (relating to verification of messages at the GCM FrontEnd). Accordingly, substantial evidence in the record supports the jury's verdict with respect to the "preprocessing" step.

### 3. "Parsing" does not require the parsing of payload data.

Finally, Google argues that the term "data" within the limitation "parsing said data with parsers corresponding to said central broadcast server" must include the payload of a message. Motion, Dkt. No. 636, at 14-16. Google further argues that SimpleAir has failed to present evidence that Google parses the payload of GCM messages. *Id*.

SimpleAir concedes that its evidence of "parsing" was limited to the parsing of the entire TCP/IP packet that is sent to Google's GCM service—not just the payload. Response (Dkt. 694), at 20-21. However, SimpleAir presented evidence that "data" would be understood by a person

of ordinary skill in the art to include the entire TCP/IP packet, not just the payload. *Id.* (citing 1/13/2014 pm Trial Transcript, Dkt. No. 611, at 152:24-155:11; 1/15/2014 pm Trial Transcript, Dkt. No. 617, at 65:15-68:3; 70:14-73:10; PX 115). Having reviewed the evidence and the parties' arguments, the Court is not persuaded that Google must parse only the payload of a message in order to meet the "parsing" limitation. Accordingly, there is substantial evidence supporting the jury's verdict.

# iii. transmitting said data to an information gateway for building data blocks and assigning addresses to said data blocks

The next disputed limitation requires, "transmitting said data to an information gateway for building data blocks and assigning addresses to said data blocks." '914 Patent at 33:24-26. In its Motion, Google challenges the evidence supporting the jury's verdict with respect to the final element, "assigning addresses to said data blocks."

To satisfy this claim element, Plaintiff's introduced evidence that the Accused Services assign the address of a unique "MCS endpoint" to GCM messages. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at155:15-162:8. Google now argues that "the plain and ordinary meaning of claim 1 requires addressing the message to a device—i.e., the intended destination of the message." Dkt. No. 636, at 16. Google further argues that the address for the MCS endpoint does not qualify as a destination address, and that Google is therefore entitled to a JMOL that this claim element is not met. *Id.* at 17-19.

In response, SimpleAir argues that: (1) the ordinary meaning of "address" is not limited to the address of a particular destination (*i.e.* a device); and alternatively (2) the MCS endpoint address <u>is</u> a destination address because it is the only address that the data block needs in order to be delivered to its intended recipient. Dkt. No. 694, at 22.

Since this issue was not raised at claim construction, the Court did not expressly construe the term "addresses" or the phrase "assigning addresses to said data blocks." The term and phrase are therefore required to be given their plain and ordinary meaning, as understood by one of ordinary skill in the art at the time of the invention. *See Phillips v. AWH Corp.*, 415 F.3d 1303, 1313 (Fed. Cir. 2005). Having reviewed the '914 patent and the testimony offered at trial, The Court is not persuaded that the phrase "assigning addresses to said data blocks" requires the assignment of <u>destination</u> addresses, as Google argues. No such limiting language is found in the claims at issue, *see* '914 Patent at 33:24-26, and SimpleAir's expert testified that that addresses identified in the claims were not required to be so limited. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 162:19-20.

Moreover, even if the Court were to accept Google's argument and find that the claim requires the assignment of so-called "destination addresses," SimpleAir has introduced sufficient evidence to support the jury's verdict. SimpleAir's Expert testified that the MCS endpoint address is "the address [the Accused Service] needs to cause that message to go to that phone." Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 161:14-23. The Court is persuaded that the MCS endpoint address therefore qualifies as a "destination address." In making its contrary argument, Google relies on a faulty premise, *i.e.* that a destination address must be the address of the target device itself (*e.g.* a phone). Such a requirement would exclude assigning the address of the "receiver associated with the destination device," which (1) is the preferred embodiment described in the specification of the '914 Patent, and which (2) Google concedes is a destination address. *See* Dkt. No. 612 (1/14/2014 am transcript (Knox)) at 100:15-101:6 (describing the preferred embodiment); Reply (Dkt. No. 730), at 6 (conceding that the address of the receiver qualifies as the address required by the claims).

Because the ordinary meaning of "address" is not limited to destination addresses, and because the MCS endpoint address identified by SimpleAir is a destination address, SimpleAir has introduced sufficient evidence to support the jury's conclusion that the Accused Services "transmit[] said data to an information gateway for building data blocks and assigning addresses to said data blocks."

# iv. transmitting preprocessed data to receivers communicating with said devices

The next disputed limitation requires, "transmitting preprocessed data to receivers communicating with said devices." '914 Patent at 33:30-31. During trial, SimpleAir's expert testified that the Accused Services perform the transmitting step at issue when Google's MCS server transmits messages to the receivers in Android smartphones and tablets. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 167:25-172:2. Google's expert further admitted that the MCS "initiates" the communication to the Android device. *See* Dkt. No. 618 (1/14/2014 am transcript (Williams)) at 38:21-43:9.

However, Google argues that (1) the actual "transmitting preprocessed data to receivers" is not performed by Google, but by the carrier infrastructure; and, (2) Google does not direct or control the carrier in such a manner that would subject it to liability under the joint infringement standard. *See Aristocrat Techs. Austl. PTY Ltd. v. Int'l Game Tech.*, 709 F.3d 1348, 1363 (Fed. Cir. 2013) (declining to impose liability for joint infringement in the absence of an agency relationship, joint enterprise, or other theory under which the accused infringer would be vicariously liable for the actions of third parties). SimpleAir counters that this is not a joint infringement case. It alleges that Google transmits the relevant messages, albeit indirectly, using the MCS server. Dkt. No. 694, at 23-24. Accordingly, SimpleAir asserts that Google is liable for direct infringement under SiRF Tech., Inc. v. Int'l Trade Comm'n, 601 F.3d 1319, 1329-30 (Fed. Cir. 2010).

The *SiRF* case dealt with patents covering the field of GPS technology. *Id.* at 1321. The relevant claims recited the steps of "communicat[ing] the satellite ephemeris to a mobile GPS receiver at a second location," (claim 1 of the asserted '651 Patent) and "transmitting the formatted data to a remote receiver" (claim 1 of the asserted '000 Patent). *Id.* at 1329 n.7, n.8. In that case, the defendants made substantially the same argument that Google now advances; *i.e.* that the "transmitting" and "communicating" steps were performed by third parties, and that the defendants did not direct or control the third parties so as to subject themselves to liability for joint infringement. *Id.* at 1329.

The Federal Circuit rejected this argument. It found that the performance of the claims did not require the actions of third parties, and held that the joint infringement standard was therefore not applicable. *Id.* at 1329 ("We do not reach the question of joint infringement because we do not read the relevant claims as requiring that any of the specified actions be taken by SiRF's customers or by the end users of the GPS devices."). The Federal Circuit explained that the defendant in *SiRF* personally performed the "communicating" and "transmitting" steps—notwithstanding the downstream actions of third parties—"because [the defendant] initiates the process of transmitting and communicating, and the files are actually transmitted to the end users." *Id.* at 1330.

The claim element at issue in this case, "transmitting data to receivers," is nearly identical to the claim language asserted in *SiRF*, "transmitting the formatted data to a remote receiver." In this case, as in *SiRF*, "[n]either the claim language nor the patent specification requires that the communication/transmission be direct." *Id.* Moreover Google's own expert admits that

Google's MCS server "initiates the information flow" that causes the receipt of data in an Android phone or tablet. *See* Dkt. No. 618 (1/14/2014 am transcript (Williams)) at 38:21-43:9. Accordingly, SimpleAir has introduced substantial evidence that Google performs the "transmitting" limitation which adequately supports the jury's verdict.

# v. instantaneously notifying said devices of receipt of said preprocessed data whether said computing devices are online or offline from a data channel associated with each device

Google contends that SimpleAir has failed to provide sufficient evidence to support the jury's verdict that the Accused Services "instantaneously notify[] said devices of receipt of said preprocessed data whether said computing devices are online or offline from a data channel associated with each device." Dkt. No. 636, at 22. Google makes two specific arguments: (1) that SimpleAir failed to introduce any evidence that the device is notified of the receipt of data when an accused Android device is online from a data channel, and (2) that the evidence shows that components within the phone—not Google itself—perform the "instantaneously notifying" limitation. Dkt. No. 636, at 22-23.

# 1. SimpleAir introduced substantial evidence supporting the jury's verdict that Google's Accused Services meet the limitation when the device is "online from a data channel."

SimpleAir's expert testified that the "instantaneously notifying" limitation is met when Google transmits push notification data from the GCM server to receivers in Android smartphones and tablets, and this transmission automatically causes the processor in the phone or tablet to be notified. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 173:4-18; 174:17-175:9. This expert further testified that the GCM server can and does transmit data to Android devices when such devices are "online from a data channel." *Id.* at 178:10-179:14 ("Even if [the application server] already has a direct connection [to the device], it can still send a [] message through

GCM."); *see also id.* at 180:22-181:4; 181:15-25. Google's representative confirmed this testimony. *See* Dkt. No. 613 (1/14/2014 pm transcript (Nerieri)) at 18:20-19:19.

Google disputes the credibility and accuracy of SimpleAir's expert testimony, citing the contrary testimony of its expert, Dr. Williams. Google is asking the Court to act in a manner that is not appropriate in a JMOL. Here, the Court must draw all reasonable inferences in favor of the nonmoving party and the Court may not make credibility determinations or weigh the evidence. *Reeves*, 530 U.S. at 150-51. The jury was not compelled to accept Google's witnesses over SimpleAir's, and in siding with SimpleAir, the jury's verdict is nonetheless supported by substantial evidence.

### 2. Google's joint infringement defense is unavailing.

As discussed above, SimpleAir's expert testified that the "instantaneously notifying" limitation is met when Google transmits push notification data from the GCM server to receivers in Android smartphones and tablets, and this transmission automatically causes the processor in the phone or tablet to be notified. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 173:4-18; 174:17-175:9. Google does not contradict this evidence. Instead, Google asserts that the receiver in the relevant Android device—not Google—notifies the processor in said device that data has been received. Dkt. No. 636, at 24. Google further argues that there is no evidence that it directs or controls the actions of third party receivers, therefore it cannot be held liable under the joint infringement standard. *Id.* at 25.

There are two steps which the Court must consider when evaluating Google's joint infringement defense. First, the Court must determine whether there is an issue of joint infringement in the first place; that is, whether any of the limitations or steps required by the asserted claims are performed by one or more third parties. If a joint infringement issue is

present, Google will only be held liable for the performance of claimed steps where it controls or directs the actions of said third party(ies). *See Aristocrat Techs.*, 709 F.3d at 1362. In this case, the Court need not reach the question of joint infringement because Google is personally responsible for the performance of the "instantaneously notifying" limitation under *SiRF*, 601 F.3d 1319 (Fed. Cir. 2010). However, even if the Court were to apply the joint infringement standard, it is apparent that Google controls the performance of the relevant third parties, and would therefore still be liable for infringement.

# a. Google is personally liable for the performance of the "instantaneously notifying" limitation.

SimpleAir introduced substantial evidence showing that the "instantaneous notifying" limitation is not performed by "components within" an android phone or tablet, but by Google's MCS server which transmits the relevant data to Android devices and by so doing automatically causes notification of the processors within such devices. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 173:4-18; 174:17-175:9. This evidence is more than sufficient to support a jury's verdict of infringement under *SiRF*, 601 F.3d at 1331 (internal citation omitted).

#### b. Google controls the receivers in Android phones and tablets.

For method claims, as are asserted in this case, a defendant is liable for infringement only if it performs "all the steps of the claimed method, either personally or through another acting under his direction or control." *Aristocrat*, 709 F.3d at 1362 (internal citation omitted). "[T]he control or direction standard is satisfied in situations where the law would traditionally hold the accused direct infringer vicariously liable for the acts committed by another party that are required to complete performance of a claimed method." *Id.* (citing *Muniauction*, 532 F.3d at 1330).

SimpleAir introduced evidence showing that Google controls the entire process of sending messages to Android devices using the accused GCM service—including the operation of the receivers that perform (unclaimed) intermediate steps. *See* Dkt. No. 617 (1/15/2014 pm transcript (Nerieri)) at 30:13-36:23; PX 50; DX 29; DX 204. A similar situation was recently addressed by this Court in *TQP Dev., LLC v. Intuit Inc.*, 2014 U.S. Dist. LEXIS 84054. In that case, Judge Bryson addressed the situation where certain steps of the claimed method were performed by the defendants' servers, while certain other steps were performed by "[the defendants'] clients' computers, with which the defendants' servers are in communication." In denying the defendants' motion for summary judgment, Judge Bryson noted that:

TQP has offered evidence through its expert that the defendants' servers direct or control the client computers because, once the process begins, the steps taken by the servers in encrypting and transmitting data automatically produce a predictable, corresponding response in the client computers that receive and decrypt the data... According to TQP's evidence, the use of the RC4 algorithm in both the server and client computers dictates that the steps taken by the server at the encryption and transmission stage result in performance of the corresponding steps in the receiver. Thus, according to TQP's evidence, once the respective computers are suitably programmed and the RC4 algorithm is selected, the defendants' servers dictate the response of the client computers that will perform the "receiver stage" steps of the claimed process.

*Id.* at \*41-42. Similarly in this case, SimpleAir has introduced substantial evidence showing that when Google's MCS server transmits data to an Android device, the processor in that device is automatically notified of the receipt of data. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 174:17-175:9. This testimony was corroborated by Google's representative, who testified that GCM code on the Android device receives messages from the GCM server. *See* Dkt. No. 617 (1/15/2014 pm transcript (Nerieri)) at 28:8-21 ("And finally, the message makes it to the GCM code on the device."). Further, SimpleAir's evidence was not contradicted by Google's expert,

who expressed no opinion on this issue. *See* Dkt. No. 188 (1/16/2014 am transcript (Williams)) at 43:3-9.

Accordingly, to the extent that Google is correct in asserting that the end-user or the Android device performs the notifying step, there is sufficient evidence in the record from which the jury could fairly conclude that Google's Control of the GCM service is so extensive that any actions performed by the end user or android device are attributable to Google.

# vi. Substantial evidence shows that Google assigns multiple addresses to multiple data blocks, transmits data to multiple receivers, and instantaneously notifies multiple devices of the receipt of said data.

Google's final argument with respect to claim 1 (which necessarily applies to the dependent claims as well), rests on Google's assertion that the claim one "require[s] assigning multiple addresses to data, transmitting the data to multiple receivers communicating with multiple devices, and having multiple receivers instantaneously notify multiple devices of receipt of said data." Dkt. No. 636, at 26.

It is undisputed that Google's GCM service delivers millions of messages to millions of devices, every day. Therefore, the Court understands Google to be arguing that the asserted claims require:

- (1) that *multiple* addresses be assigned to the *same* data blocks;
- (2) that the same data blocks be transmitted to multiple receivers; and
- (3) that the Accused Services instantaneously notify *multiple* devices of the receipt of the *same* data.<sup>1</sup>

This argument is meritless. As stated above, the Court finds that SimpleAir introduced sufficient evidence to support the jury's verdict that the Accused Services meet each of the

<sup>&</sup>lt;sup>1</sup>Google has not challenged this characterization of its argument. *See* Dkt. No. 730 at 9.

disputed imitations raised in Google's Motion. Nothing in the claims requires that multiple addresses be assigned to a single group of data blocks; and, nothing in the claims requires that a single group of data blocks transmitted to multiple receivers (*i.e.*, by sending a single message at the same time to multiple devices). *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 107:19-108:2. Even assuming that the claims could be read to require such treatment, SimpleAir introduced substantial evidence showing that GCM allows for—and performs—the sending of one message to multiple recipients. *See* Dkt. No. 611 (1/13/2014 pm transcript (Knox)) at 108:3-6; Dkt No. 618 (1/16/2014 am transcript (Williams)) at 35:22-38:3. Accordingly, even if the Court were to adopt Google's strained reading of the claims—which the Court does not—substantial evidence would nevertheless support the jury's verdict.

# vii. Substantial evidence supports the jury's verdict that Google performs each limitation of the dependent claims.

Google argues that SimpleAir failed to introduce sufficient evidence to support the jury's verdict that Google performs, or directs or controls others' performance of, the steps required in dependent claims 2 and 22. Google's argument consists of a single sentence directed to each claim, and Google provides no explanation or analysis that might support its assertions. *See* Dkt. No. 636, at 27. With respect to dependent claims 3 and 7, Google's argument is limited to a recitation of its allegation that third parties, not Google, "actually transmit the preprocessed data." *Id.* 

This Court's Local Rule 7 requires a "concise statement of the reasons in support of the motion and a citation of the authorities upon which the movant relies." The Court will not ignore its own local rule and entertain bare assertions of the kind Google puts forward here. Google has failed to meet even the low bar set by the Court's Local Rules and Federal Rule of Civil Procedure

7(b)(1)(B). The Court therefore concludes that Google has waived its challenge to the jury's verdict with respect to the dependent claims asserted by SimpleAir, except to the extent that infringement of the dependent claims requires infringement of independent claim 1, addressed above.

However, and even had Google not effectively waived its challenge to the asserted dependent claims, SimpleAir introduced sufficient evidence during the trial to support the jury's verdict with respect to claims 2, 3, 7 and 22. *See e.g.* Dkt. No. 612 (1/14/2014 am transcript (Knox)) at 18:19-26:16. Further, and for the same reasons discussed above, SimpleAir provided substantial evidence at trial that Google, and not a third party, performs the "transmitting" steps at issue. The jury's verdict must consequently be upheld.

### IV. JUDGMENT OF NO INVALIDITY

At trial, Google presented evidence that the combination of three pieces of prior art rendered the asserted claims of the '914 Patent obvious, and therefore invalid:

- the "SkyTel System" (a network of information sources, receivers, and consumer devices);
- (2) U.S. Patent No. 5,819,284 ("the '284 Patent" or "the AT&T Patent") (DX 376); and
- (3) U.S. Patent No. 5,327,486 ("the '486 Patent" or "the Bell Patent") (DX 383).

As a threshold matter, SimpleAir challenged Google's assertion that the SkyTel system qualifies as a single prior art reference, arguing that the SkyTel system is itself a combination of seventeen individual prior art references. SimpleAir further argued that the cited prior art—whether counted as three or nineteen references—failed to disclose certain limitations stated in the asserted claims, and that it would not have been obvious to one of ordinary skill in the art to combine the SkyTel System with the '284 and '486 Patents. After hearing the evidence presented by both parties, the jury rendered a verdict that the asserted claims of the '914 Patent were not invalid. Dkt. No. 601.

#### A. Applicable Law

As stated above, JMOL is appropriate where "a reasonable jury would not have a legally sufficient evidentiary basis to find for the [non-moving] party on that issue." *i4i Lt. Partnership*, 598 F.3d at 841. The jury's verdict has a legally sufficient evidentiary basis if it is supported by substantial evidence, which is "more than a mere scintilla" and is "such relevant evidence as a reasonable mind might accept as adequate to support a conclusion." *z4 Techs. Inc. v. Microsoft Corp.*, 507 F.3d 1340, 1353 (Fed. Cir. 2007) (internal citations omitted). In evaluating Google's JMOLs, the Court "reviews all evidence in the record and must draw all reasonable inferences in favor of the nonmoving party; however, a court may not make credibility determinations or weigh the evidence, as those are solely functions of the jury." *Fractus, S.A. v. Samsung Elecs. Co.*, 876 F. Supp. 2d 802, 813 (E.D. Tex. 2012) (citing *Reeves v. Sanderson Plumbing Prods., Inc.*, 530 U.S. 133, 150-51 (2000)).

Further, Google had the burden of proving invalidity at trial by clear and convincing evidence. *See e.g. Broadcom Corp. v. Emulex Corp.*, 732 F.3d 1325, 1334 (Fed. Cir. 2013). "The Federal Circuit is clear that '[c]ourts grant JMOL for the party bearing the burden of proof only in extreme cases, when the party bearing the burden of proof has established its case by evidence that the jury would not be at liberty to disbelieve and the only reasonable conclusion is in its favor." *Hitachi Consumer Elecs. Co. v. Top Victory Elecs. Taiwan Co.*, 2013 U.S. Dist. LEXIS 133595, at \*15 (E.D. Tex. Sept. 18, 2013) (quoting *Mentor H/S, Inc. v. Med. Device Alliance, Inc.*, 244 F.3d 1365, 1375) (Fed. Cir. 2001).

#### **B.** Analysis

35 U.S.C. § 103 "forbids issuance of a patent when 'the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains." *KSR Int'l Co. v. Teleflex Inc.*, 550 U.S. 398, 405, 127 S. Ct. 1727, 167 L. Ed. 2d 705 (2007) (quoting 35 U.S.C. § 103). Where, as here, a defendant seeks to invalidate a patent as obvious in light of a combination of prior art, it must demonstrate "'that a skilled artisan would have been motivated to combine the teachings of the prior art references to achieve the claimed invention, and that the skilled artisan would have had a reasonable expectation of success in doing so." *Procter & Gamble Co. v. Teva Pharm. USA, Inc.*, 566 F.3d 989, 994 (Fed. Cir. 2009) (quoting *Pfizer, Inc. v. Apotex, Inc.*, 480 F.3d 1348, 1361 (Fed. Cir. 2007)). At all times, the defendant bears the burden the burden of establishing, by clear and convincing evidence, that the patent is obvious. *Kinetic Concepts, Inc. v. Smith & Nephew, Inc.*, 688 F.3d 1342, 1360 (Fed. Cir. 2012).

# i. SimpleAir introduced substantial evidence that the cited prior art fails to disclose each limitation of the asserted claims.

At trial, the parties disputed whether or not the cited prior art discloses each limitation of the asserted claims. In particular, SimpleAir asserted that the prior art fails to disclose notification "whether said computing devices are online or offline from a data channel." Google disagreed, arguing that the limitation was met by the Skytel System, and specifically by the connection between: (1) a Sony Magic Link device, (2) AT&T Personal Link, and (3) AOL. *See* Dkt. No. 618 (1/16/2014 am transcript (Eastburn)) at 127:5-139:15.

At trial, SimpleAir introduced expert testimony that the connections to AT&T Personal Link and AOL do not meet the definition of a "data channel," as construed by the Court, and that Sony Magic Link devices could not receive data "whether [they] are or are not connected to a data channel." See Dkt. No. 619 (1/16/2014 pm transcript (Knox)) at 22:19-25:15. Unsurprisingly, Google introduced contradictory expert testimony and other evidence in an effort to convince the jury that the cited prior art rendered the asserted claims obvious and therefore invalid. See e.g. Dkt. No. 618 (1/16/14 am transcript (Eastburn)) at 121:15-144:8. Confronted with such contradictory expert testimony, "the jury was free to 'make credibility determinations and believe the witness it considers more trustworthy."" Kinetic Concepts, Inc., 688 F.3d at 1362 (citing Streber v. Hunter, 221 F.3d 701, 726 (5th Cir. 2000)). In light of the jury's verdict that Google failed to prove obviousness, the Court must infer that the jury found SimpleAir's expert to be credible and persuasive on this point, and accepted his testimony over that of Google's expert. Id. With that inference, there is substantial evidence supporting the jury's conclusion that the cited prior art failed to disclose notification "whether said computing devices are online or offline from a data channel."

To prove obviousness, Google must show that a skilled artisan would have had a reasonable expectation of success in combining or modifying the cited prior art to achieve the invention expressed in the asserted claims. *See Innogenetics, N.V. v. Abbott Labs.*, 512 F.3d 1363, 1374 (Fed. Cir. 2008). Inferring, as the Court must, that the notification limitation was missing from the cited prior art, it follows that a mere combination of the cited prior art could not succeed. Because Google has not even argued that it would have been obvious to modify the prior art to achieve the claimed invention, and because SimpleAir introduced evidence that such modification

would not have been obvious, *see* Dkt. No. 619 (1/23/2014 pm transcript (Knox)) at 25:16-27:16, there is more than enough evidence in the record to support the jury's verdict of no invalidity.

# ii. Google failed to show by clear and convincing evidence that it would have been obvious to combine or modify the cited prior art.

"[A] patent composed of several elements is not proved obvious merely by demonstrating that each of its elements was, independently, known in the prior art." *KSR International Co.*, 550 U.S. at 418. Instead, "the burden falls on the patent challenger to show by clear and convincing evidence that a person of ordinary skill in the art [1] would have had reason to attempt to make the composition or device, or carry out the claimed process, and [2] would have had a reasonable expectation of success in doing so." *Pharmastem Therapeutics, Inc. v. Viacell, Inc.*, 491 F.3d 1342, 1360 (Fed. Cir. 2007); *see also KSR International Co.*, 550 U.S. at 418 (it can be "important to identify a reason that would have prompted a person of ordinary skill in the references disclosed all of the limitations of the asserted claims, which they do not, [defendant] still needed to proffer evidence indicating why a person having ordinary skill in the art would combine the references to arrive at the claimed invention."

At trial, Google primarily relied on testimony from its expert witness that the Skytel System comprised a single prior art reference, and that it would have been obvious to one of ordinary skill in the art to combine the SkyTel System with the '284 and '486 Patents. *See e.g.* Dkt. No. 618 (1/16/2014 am transcript (Eastburn)), at 127:21-130:12. SimpleAir introduced contrary testimony from its expert. Specifically, SimpleAir's expert testified that there was never a unitary "SkyTel system," but rather that the SkyTel System was itself a combination of seventeen prior art references. Dkt. No. 619 (1/16/2014 pm transcript (Knox)), at 14:7-15:22. SimpleAir's expert

further testified that it would not have been obvious to one of ordinary skill in the art to combine the seventeen Skytel Network references with the two patents also cited by Google. *Id.* at 25:16-27.

Having reviewed the entire record and drawing all reasonable inferences in the nonmoving party's favor, the Court is not persuaded that Google has established its case by evidence that the jury would "not be at liberty to disbelieve," or that the only reasonable conclusion the jury could have drawn was that it would have been obvious to combine the cited prior art to accomplish the patented invention. *Hitachi*, 2013 U.S. Dist. LEXIS 133595, at \*15. For example, much of the expert testimony Google presented at trial consisted of conclusory statements that one of ordinary skill would have combined the references Google cited. *See* Dkt. No. 618 (1/16/2014 am transcript (Eastburn)) at 127:18-128:8 (stating that it would be obvious to combine the SkyTel System and AT&T Patent because "the Skytel system received similar types of information"). The jury was free to disregard such testimony, and the Court must infer that it did. *See Fractus S.A. v. Samsung Elecs. Co.*, 876 F. Supp. 2d 802, 827 (E.D. Tex. 2012) ("Such conclusory testimony regarding obviousness failed to provide the jury with an understanding of why a person of ordinary skill would have found the limitations obvious."

Google seems to argue that jury's verdict is insupportable, because it does not track the narrative that Google's witnesses advanced at trial. This is not an argument upon which the Court may grant JMOL. The jury is the only entity empowered to "make credibility determinations or weigh the evidence." *Id.* at 813. It was free to disregard the conclusory statements made by Google's expert or otherwise credit the evidence introduced by SimpleAir over the evidence introduced by Google. Indeed, because of the procedural posture of this case, the Court *must* assume that the jury found SimpleAir's experts and other witnesses to be credible and persuasive.

*See Kinetic Concepts, Inc.*, 688 F.3d at 1365. Accordingly, there is more than enough evidence in the record to support the jury's verdict.

# iii. The jury could have reasonably concluded that the objective evidence established that the asserted claims were not obvious.

"The final underlying factual issue in the obviousness determination is objective evidence of non-obviousness, *i.e.*, secondary considerations." *WMS Gaming, Inc. v. International Game Tech.*, 184 F.3d 1339, 1359 (Fed. Cir. 1999). Such secondary considerations "may include commercial success, long-felt but unsolved need, and licenses showing industry respect," which may support a jury's verdict of non-obviousness. *See Id.*; *Transocean Offshore Deepwater Drilling, Inc. v. Maersk Drilling*, 699 F.3d 1340, 1349 (Fed. Cir. 2012); *Fractus, S.A. v. Samsung Elecs. Co.*, 876 F. Supp. 2d 802, 827-28 (E.D. Tex. 2012).

Here, SimpleAir introduced evidence of several secondary considerations indicating non-obviousness, including evidence related to industry praise for SimpleAir and the commercial embodiment of the asserted claims; and, evidence that other companies in the industry, including Apple, Microsoft, and RIM entered into licensing agreements with SimpleAir. *See* Dkt. No. 615 (1/15/2014 am transcript (Payne) at 30:7-34:1 (describing awards); PX 98 at 31 (summarizing awards); Dkt No. 614 (1/14/2014 pm transcript (Mills)) 49:12-50:12 (describing industry licenses); PX 181 (Apple Agreement); PX 295 (Microsoft Agreement); DX 355 (RIM Agreement). Such evidence is sufficient to support the jury's verdict, and defeat Google's motion.

# V. CONCLUSION

For all of the reasons stated above, Google's Renewed Motion for Judgment as a Matter of Law Regarding Infringement (Dkt. No. 636) and Google's Renewed Motion for Judgment as a Matter of Law Regarding Invalidity (Dkt. No. 637) are hereby **DENIED** in all respects.

So ORDERED and SIGNED this 30th day of September, 2014.

RODNE GILSTRAP

UNITED STATES DISTRICT JUDGE