

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

META PLATFORMS, INC.,
Petitioner,

v.

ALMONDNET, INC. and INTENT IQ, LLC,
Patent Owner.

IPR2023-01281
Patent 10,715,878 B2

Before KRISTEN L. DROESCH, STACEY G. WHITE, and
SCOTT B. HOWARD, *Administrative Patent Judges*.

WHITE, *Administrative Patent Judge*.

DECISION
Granting Institution of *Inter Partes* Review
35 U.S.C. § 314

I. INTRODUCTION

Meta Platforms, Inc. (“Petitioner”) filed a Petition requesting an *inter partes* review of claims 1–4 and 6–23 of U.S. Patent No. 10,715,878 B2 (Ex. 1001, “the ’878 patent”). Paper 2 (“Pet.”). Intent IQ, LLC¹ (“Patent Owner”) filed a Preliminary Response. Paper 6 (“Prelim. Resp.”).

Under 35 U.S.C. § 314(a), an *inter partes* review may not be instituted unless the information presented in the petition “shows that there is a reasonable likelihood that the petitioner would prevail with respect to at least 1 of the claims challenged in the petition.” The following findings of fact and conclusions of law are not final, but are made for the sole purpose of determining whether Petitioner meets the threshold for initiating review.

For the reasons stated below, we determine that Petitioner has established a reasonable likelihood that it would prevail with respect to at least one claim. We hereby institute an *inter partes* review as to all of the challenged claims of the ’878 patent on all of the asserted grounds.

A. Related Matters

The parties identify the following related district court proceedings:
AlmondNet, Inc. v. Meta Platforms, Inc., No. 4:23-cv-00438 (N.D. Cal);
AlmondNet, Inc. v. Samsung Elecs. Co., No. 4:22-cv-07515 (N.D. Cal.);
AlmondNet, Inc. v. Amazon.com, Inc., No. 6:22-cv-01204 (W.D. Tex.);

¹ AlmondNet, Inc. is listed on the faces of the Petition and Preliminary Response as a patent owner. AlmondNet, Inc, however, is identified as a licensee of the ’878 patent. Paper 4, 1. Petitioner and Patent Owner identify themselves as the only real parties-in-interest in this proceeding. *Id.*, Pet. 1. For the purposes of this Decision, we see no need to comment further regarding the status of AlmondNet, Inc. The parties shall meet and confer and, within 14 days of this decision, inform the Board whether AlmondNet should be removed from the caption.

AlmondNet, Inc. v. Microsoft Corp., No. 6:22-cv-01206 (W.D. Tex.); *AlmondNet, Inc. v. Roku, Inc.*, No. 6:21-cv-00731 (W.D. Tex.); *Roku, Inc. v. AlmondNet, Inc.*, No. 1:21-cv-01035 (D. Del.). Pet. 1; Paper 4, 1. Petitioner further indicates that the '878 patent was at issue in *Roku, Inc. v. Intent IQ, LLC*, IPR2022-01315 and *Samsung Electronics Co. v. Intent IQ, LLC*, IPR2022-01505 (institution denied in both). Pet. 2. Petitioner further identifies the following proceedings involving Petitioner and Patent Owner: IPR2022-00773, IPR2022-01064, and IPR2022-01436. Pet. 1–2.

B. The '878 Patent (Ex. 1001)

The '878 patent is titled “Targeted Television Advertisements Based on Online Behavior.” Ex. 1001, code (54). The '878 patent describes delivering targeted television advertisements “based on observed online (i.e., Internet) behavior of a television viewer without employing personally identifiable information.” *Id.* at 1:24–27. Figure 7, reproduced below, shows an exemplary system for serving targeted television advertisements based on a user’s online behavior (*id.* at 13:4–5).

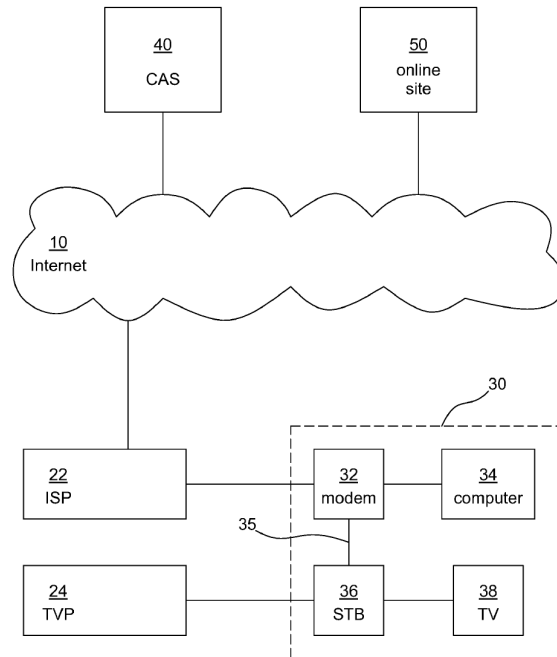


FIG. 7

Figure 7, reproduced above, depicts modem 32, computer 34, set-top box (STB) 36, and television 38 associated with user 30. *Id.* at 9:38–40, 9:50–54. Internet service provider (ISP) 22 assigns a dynamic IP address to modem 32. *Id.* at 9:57–61; 13:50–52. In Figure 7, STB 36 is connected to modem 32 via connection 35 to obtain online access via the same IP address at modem 32. *Id.* at 13:17–24. “For example, STB 36 can be connected to a local area network (LAN) that shares [modem] 32 for online access. In such an arrangement, network traffic is routed to a common IP address (i.e., the IP address of modem 32) for STB 36 and other devices [e.g., computer 34] connected to the LAN.” *Id.* at 13:24–46, 13:52–60. “The term ‘common IP address’ denotes the IP address of a modem or other online access device to which remote network traffic is routed for each of multiple devices sharing a common connection.” *Id.* at 13:34–37. “The common IP address is dynamically assigned by ISP 22 to the user’s modem 32 or other online access equipment.” *Id.* at 13:50–52. That common IP address comprises an

electronic association between online access and STB IP addresses, which enables delivery of targeted television advertising to STB 36 based on online activity observed as originating from the common IP address of modem 32.

Id. at 12:37–13:2, 13:17–22, 14:1–8.

C. Illustrative Claim

Claims 1, 13, and 22 are independent. Claim 1 is illustrative and reproduced below.

1. A method for identifying an association among multiple electronic devices of a group of devices connected through a common local area network (LAN) and using the association for cross-device action, the method comprising:

(a) with a computer system, determining an association between device identifiers of two or more Internet-accessing electronic devices based on electronically stored association-detection information about a plurality of Internet-accessing electronic devices, wherein the stored association-detection information for each of the plurality of Internet-accessing electronic devices includes:

(i) a device identifier;

(ii) at least one dynamically assigned IP address assigned to a modem that connects a router of the LAN to the Internet; and

(iii) at least one timestamp specifying a time when the Internet-accessing electronic device accessed the Internet via the router of the LAN;

(b) wherein determining the association in part (a) is done by using the stored association-detection information to determine that the two or more Internet-accessing electronic devices have separately accessed the Internet through a router of the LAN during a predetermined period of time via a common IP address;

(c) wherein the computer system determining the association in part (a) is outside the LAN and is connected to the LAN through the Internet; and

(d) with the computer system, using the association determined in part (a) to utilize user profile information associated with the device identifier of a first of the associated Internet-accessing electronic devices, and comprising behavioral or demographic data collected via the first of the associated Internet-accessing electronic devices, to take an automatic action with respect to a second of the associated Internet-accessing electronic devices using the device identifier of the second of the associated Internet-accessing electronic devices.

Ex. 1001, 24:25–62.

D. Asserted Grounds of Unpatentability

Petitioner, supported by the Declaration of Christopher M. Schmandt (Ex. 1002), asserts the following grounds of unpatentability (Pet. 4)²:

Claim(s) Challenged	35 U.S.C. §	Reference(s)/Basis
1, 2, 8–10, 13, 14, 19, 22	103	Baig, ³ Laidlaw, ⁴ Sitaraman, ⁵ Hahn ⁶
3, 4, 15, 16	103	Baig, Laidlaw, Sitaraman, Hahn, Xu ⁷

² We apply the pre-AIA version of 35 U.S.C. § 103 because it appears the claims at issue have an effective filing date prior to March 16, 2013, the effective date of the Leahy-Smith America Invents Act, Pub. L. No. 112-29, 125 Stat. 284 (2011) (“AIA”). *See* Ex. 1001, code (60); Pet. 5.

³ U.S. Pat. Pub. 2008/0113674 A1, published May 15, 2008 (Ex. 1003, “Baig”).

⁴ U.S. Pat. Pub. 2004/0128547 A1, published July 1, 2004 (Ex. 1006, “Laidlaw”).

⁵ U.S. Pat. No. 6,427,170 B1, issued July 30, 2002 (Ex. 1007, “Sitaraman”).

⁶ Harley Hahn, *The Internet Complete Reference* (2d ed. 1996) (Ex. 1008, “Hahn”).

⁷ U.S. Pat. No. 7,730,030 B1, issued June 1, 2010 (Ex. 1009, “Xu”).

Claim(s) Challenged	35 U.S.C. §	Reference(s)/Basis
6, 7, 17, 18	103	Baig, Laidlaw, Sitaraman, Hahn, Gerace ⁸
11, 12, 20, 21, 23	103	Baig, Laidlaw, Sitaraman, Hahn, Xu, Gerace

II. ANALYSIS

A. Level of Ordinary Skill in the Art

In order to determine whether an invention would have been obvious, we consider the level of ordinary skill in the pertinent art at critical time. *Graham v. John Deere Co. of Kan. City*, 383 U.S. 1, 17 (1966). The resolution of this question is important because it allows us to “maintain[] objectivity in the obviousness inquiry.” *Ryko Mfg. Co. v. Nu-Star, Inc.*, 950 F.2d 714, 718 (Fed. Cir. 1991).). In assessing the level of ordinary skill in the art, various factors may be considered, including the “type of problems encountered in the art; prior art solutions to those problems; rapidity with which innovations are made; sophistication of the technology; and educational level of active workers in the field.” *In re GPAC, Inc.*, 57 F.3d 1573, 1579 (Fed. Cir. 1995). Generally, it is easier to establish obviousness under a higher level of ordinary skill in the art. *Innovention Toys, LLC v. MGA Entm’t, Inc.*, 637 F.3d 1314, 1323 (Fed. Cir. 2011) (“A less sophisticated level of skill generally favors a determination of nonobviousness . . . while a higher level of skill favors the reverse.”).

Petitioner asserts that a person of ordinary skill in the art “would have possessed a bachelor’s degree in electrical engineering or computer science,

⁸ U.S. Pat. Pub. 2006/0282328 A1, published Dec. 14, 2006 (Ex. 1010, “Gerace”).

and two years of work experience in the field of network-based computer systems, such as systems for sending and receiving information over local networks and wide area networks (such as the Internet or World Wide Web).” Pet. 5 (citing Ex. 1002 ¶¶ 10–14). At this time, Patent Owner does not challenge Petitioner’s description of the level of ordinary skill in the art. Prelim. Resp. 3. We are persuaded that Petitioner’s description is consistent with the prior art and patent specification. *See Okajima v. Bourdeau*, 261 F.3d 1350, 1355 (Fed. Cir. 2001). For purposes of this Decision, we adopt Petitioner’s description.

B. Claim Construction

In an *inter partes* review proceeding, a patent claim shall be construed using the same claim construction standard that would be used to construe the claim in a civil action under 35 U.S.C. § 282(b). 37 C.F.R. 42.100(b) (2023). Our rule adopts the same claim construction standard used by Article III federal courts, which follow *Phillips v. AWH Corp.*, 415 F.3d 1303 (Fed. Cir. 2005) (en banc), and its progeny. Under this standard, the words of a claim are generally given their “ordinary and customary meaning,” which is the meaning the term would have to a person of ordinary skill at the time of the invention, in the context of the entire patent including the specification. *See Phillips*, 415 F.3d at 1312–13.

Petitioner “does not believe claim construction is necessary at this time.” Pet. 7. Patent Owner “does not believe that any terms require express construction to resolve the parties’ dispute.” Prelim. Resp. 4. We determine that no claim terms require express construction for purposes of this Decision.

C. Overview of the Asserted Prior Art

1. Baig (Ex. 1003)

a) Overview of Baig

Baig relates to providing services for mobile devices which are in communication with local area network wireless access points.

Ex. 1003 ¶ 2.

Figure 1 of Baig is reproduced below.

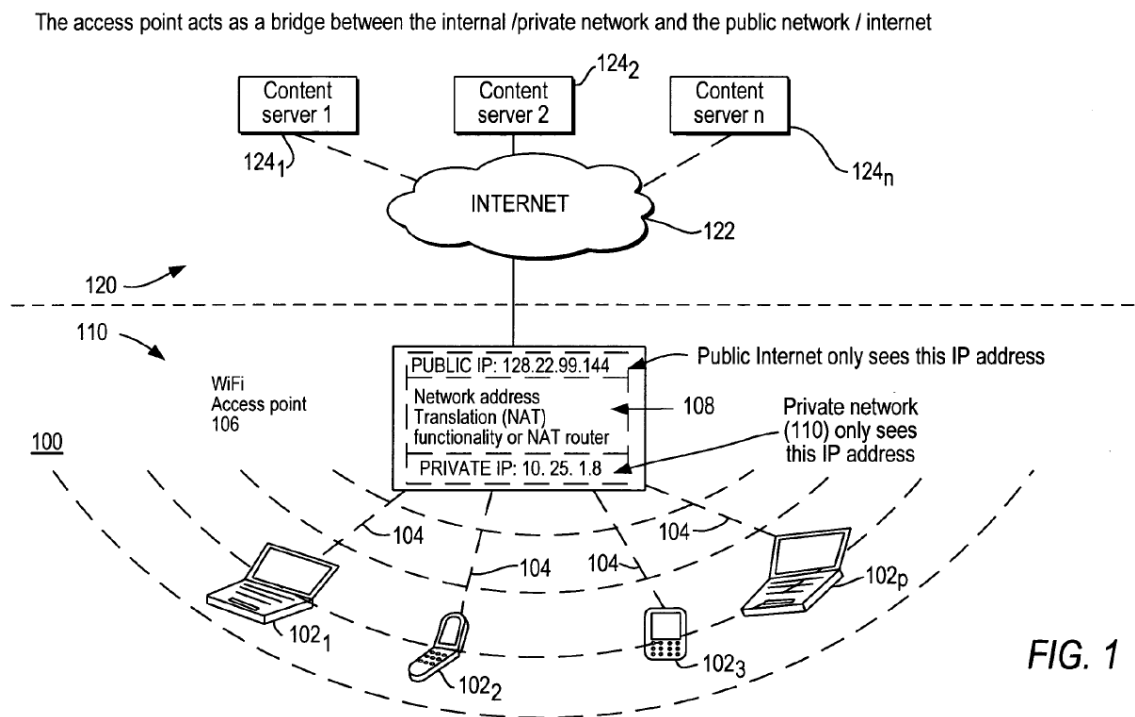


Figure 1 depicts a block diagram of communications network 100 including public wireless hotspot 110 communicably coupled to public network 120 via access point 106. *Id.* ¶¶ 13, 42. Public network 120 includes content servers 124₁, 124₂, 124_n that store and host information from websites. *Id.* ¶ 42. WiFi hotspot 110 enables at least one mobile device 102₁–102_p to communicate over local private network 104 and

communicate with content servers 124₁, 124₂, 124_n over Internet 122.

Id. ¶ 43.

Access point 106 includes a network address translation (NAT) router 108 that provides network address translation. *Id.* ¶ 43. Access point 106 utilizes a unique public IP address which relays data between public network 120 and wireless mobile devices 102 connected to local private wireless network 104. *Id.* ¶¶ 44–45. When mobile device 102 requests information from public network 120, it sends data packets containing a local IP address to access point 106. *Id.* ¶ 45. All devices on local private network 104 use local IP addresses that are not visible to public networks. *Id.* Access point 106 interacts with public network 120 with a public IP address, which is visible to all devices on public internet 122. *Id.* Access point 106, which includes NAT router 108, replaces the local IP address with its own public IP address and forwards the packets to content server 124 on public network 120. *Id.* ¶¶ 46, 51. When public network 120 sends packetized information back to requesting mobile device 102, NAT router 108 replaces the public IP address with the local IP address for mobile device 102 and routes the packetized information to the requesting mobile device 102. *Id.* ¶ 46.

Baig also discloses a vicinity-based community service provider (VCSP) having at least one content server that discovers wireless users within physical vicinity of each other at a WiFi hotspot. *Id.* ¶¶ 38, 52. The VCSP content server includes programs and data for hosting a VCSP website. *Id.* ¶ 53. The VCSP server receives a login request from a user that is connected to a particular WiFi access point (hotspot), identifies the unique IP address of each WiFi access point, and identifies all users who have

logged in from a common hotspot as having the same access point IP address, and forms a vicinity-based user group at each hotspot. *Id.* ¶¶ 38, 52, 55–59, Fig. 3. When a user at a hotspot logs onto the VCSP website, the user automatically becomes part of the vicinity-based user group, and then can access VCSP webpages to participate in or receive an offered service and communicate with other VCSP users via a chat room. *Id.* ¶ 59. Once the user logs into the VCSP website, the server presents a webpage to the user on his or her mobile device. *Id.* ¶ 74.

Figure 6 of Baig is reproduced below.

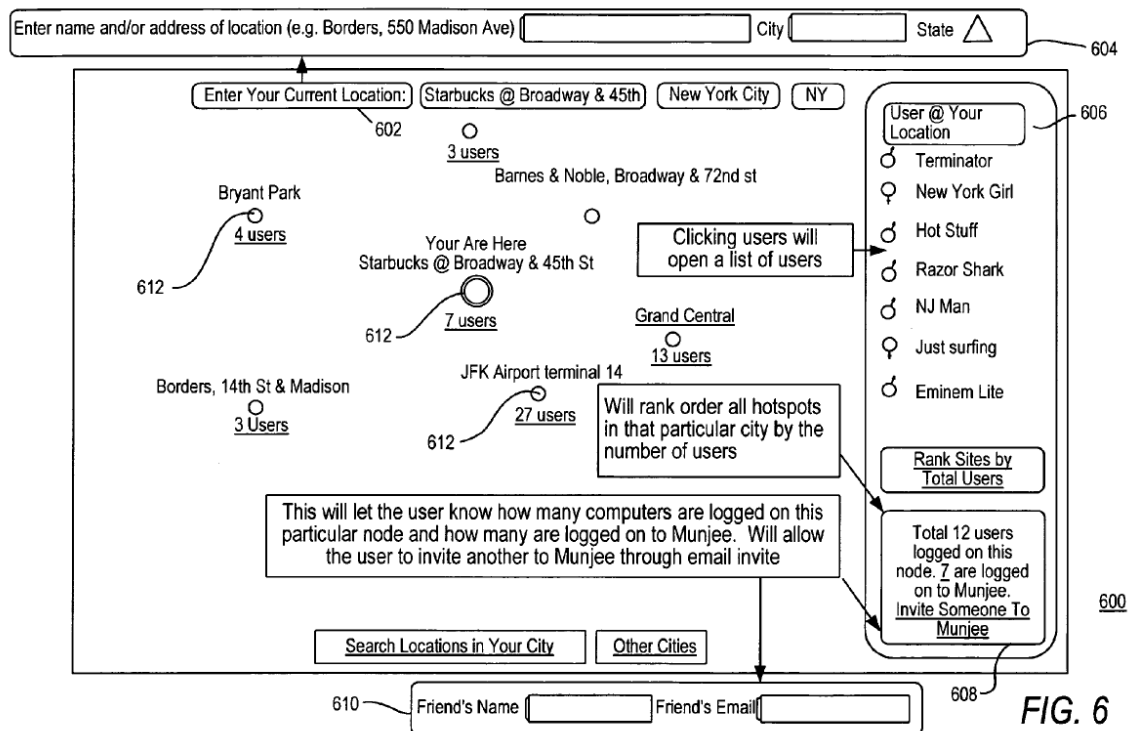


FIG. 6

Figure 6 depicts a graphical user interface displaying a webpage. *Id.* ¶¶ 18, 75. The webpage includes list 606 of other users by username (e.g., “Terminator,” “Just surfing”) at the present hotspot. *Id.* ¶ 76. List 606 includes gender symbols for each username. *Id.* at Fig. 6.

b) Entitlement of Baig to Earlier Effective Filing Date

Petitioner asserts that Baig is entitled to the November 10, 2006 filing date of Provisional Application No. 60/858,204 (Ex. 1004, “’204 Provisional”), and is prior art to the ’878 Patent under pre-AIA 35 U.S.C. § 102(e). Pet. 9. Petitioner asserts that the ’204 Provisional provides support for the disclosure of Baig and provides § 112 support for at least one claim in Baig. *Id.* Petitioner asserts that there are no material differences between Baig and the ’204 Provisional. *Id.* at 10 (citing Ex. 1002 ¶ 43 (citing Ex. 1005 (redline comparison of Ex. 1003 and Ex. 1004))). Petitioner further contends that the ’204 Provisional includes 17 claims that are identical to the claims in Baig, and, therefore, provides written description support for the corresponding claims in Baig. *Id.* Petitioner also asserts the ’204 Provisional provides enablement. *Id.*

At this preliminary stage in which Patent Owner has not challenged the status of Baig as prior art, Petitioner has shown sufficiently that Baig is entitled to the earlier effective filing date of the ’204 Provisional Application. Although the burden of production may shift between the parties during trial, the burden of persuasion to show that Baig is entitled to an earlier effective filing date always remains with Petitioner. *See Dynamic Drinkware, LLC v. Nat’l Graphics, Inc.*, 800 F.3d 1375, 1379–80 (Fed. Cir. 2015).

2. Laidlaw (Ex. 1006)

Laidlaw relates to session management in web applications. Ex. 1006 ¶¶ 1–2. Laidlaw describes secure session management using session tokens and cookies, and storing information in a session table. *Id.* ¶¶ 4, 6, 16.

3. *Sitaraman (Ex. 1007)*

Sitaraman relates to “managing IP addresses on a data communications network utilizing dynamic IP address assignment.” Ex. 1007, 1:6–10. Sitaraman describes the operation of the Dynamic Host Configuration Protocol (DHCP). *Id.* at 3:31–51.

4. *Hahn (Ex. 1008)*

Hahn, a textbook titled “The Internet Complete Reference,” describes automatically updating information displayed on a webpage. Ex. 1008, 3, 48. The webpage may tell the browser to reload itself automatically in a technique called “CLIENT PULL.” *Id.* Alternatively, a server may send new data on its own, without the browser making a request, in a technique called “SERVER PUSH.” *Id.*

5. *Xu (Ex. 1009)*

Xu relates to online virtual communities. Ex. 1009, 1:7–13. Xu discloses a user database storing user preferences or settings such as privacy and security settings, e.g., “if the user should be anonymous or invisible to the rest of the community.” *Id.* at 26:5–17.

6. *Gerace (Ex. 1010)*

Gerace relates to computer-based targeted advertising. Ex. 1010, codes (54), (57). Gerace discloses deducing a user’s demographic information from “shared behavior with other users (behavior or activities in common with) or shared relationships to other users.” *Id.* ¶ 83.

*D. Obviousness Over Baig, Laidlaw,
Sitaraman, and Hahn*

Petitioner asserts that claims 1, 2, 8–10, 13, 14, 19, and 22 are unpatentable under 35 U.S.C. § 103 as obvious over the teachings of Baig,

Laidlaw, Sitaraman, and Hahn, citing the Declaration of Christopher M. Schmandt for support. Pet. 11–54 (citing Ex. 1002).

1. Independent Claims 1, 13, and 22

Petitioner asserts that independent claims 1, 13, and 22 are unpatentable under 35 U.S.C. § 103 as obvious over Baig, Laidlaw, Sitaraman, and Hahn. Pet. 11–49, 52–54. The parties appear to agree that claims 13 and 22 are substantially similar to claim 1. *Id.* at 52, 53; Prelim. Resp. 16–17. In addition, Petitioner’s arguments and evidence for claims 13 and 22 are substantially identical to those proffered for claim 1. *See* Pet. 52–54. As such, our analysis of the challenge to claim 1 applies with equal force to the challenges to claims 13 and 22.

We have reviewed Petitioner’s assertions and evidence in light of Patent Owner’s arguments and for the purposes of Institution, we find Petitioner’s challenges to be sufficient to meet the threshold of § 314. Petitioner’s challenge may be summarized as follows: Petitioner relies on Baig to teach “a technique for identifying when multiple mobile devices are connected to a common local area network (LAN).” *Id.* at 11. Specifically, Baig creates a vicinity-based community of devices that are connected to the same hotspot. *Id.* “In order to determine whether the two or more mobile devices 102 are connected to a common LAN, the content server checks to see if they are connected through an access point 106 having a common IP address.” *Id.* at 14. Baig’s content server sits outside of the LAN. *Id.* at 37–38. Mobile devices in this vicinity-based community are presented with “a webpage that shows, among other things, a list 660 of other users whose devices are connected to the same hotspot 110.” *Id.* at 15. Further, “the mobile devices connected to the same hotspot can utilize a number cross-

device services including ‘bartering services for goods and services among wireless users in a vicinity,’ ‘enabling WiFi users in the vicinity to play video games with one-another, providing chat rooms, among other activities and services.’” *Id.* at 16 (citing Ex. 1003 ¶ 54).

Petitioner asserts that each mobile device would have a “‘device identifier’ in the form of a cookie, which is electronically stored by the content server and used to identify the mobile device as currently logged-in.” *Id.* at 18–19 (citing Ex. 1002 ¶¶ 83, 87–92; Ex. 1006 ¶¶ 6, 16).

According to Petitioner, the use of these cookies is taught by the combination of Baig and Laidlaw. *Id.* at 20. Petitioner directs us to Laidlaw’s disclosure of a “session table” that stores information for each session for a device. *Id.* at 21. Session tables contain session tokens and those tokens are stored within cookies. *Id.* Petitioner contends that “[t]he cookie under the proposed Baig-Laidlaw combination provides a device identifier because it contains a session token uniquely identifying the session assigned to mobile device 102 that was used to log in and access the content server.” *Id.* at 23. According to Petitioner, Laidlaw discusses a commonly known technique for keeping track of connected devices and person of ordinary skill in the art would have applied this technique to Baig in order “to store session information about mobile devices to (at a minimum) keep track of currently logged in devices.” *Id.* at 27–28 (citing Ex. 1002 ¶ 105).

As for the dynamically assigned IP address of claim 1, Petitioner directs us to Baig’s discussion of IP addresses for WiFi access points. *Id.* at 30. Petitioner, however, points out that Baig relies on static IP addresses and asserts that the use of dynamic addresses would have been obvious in light of Sitaraman. *Id.* at 30–31. Sitaraman discusses the “well-known”

technique of using a Dynamic Host Configuration Protocol (“DHCP”) server to provide IP addresses and configuration parameters. *Id.* at 31. According to Petitioner, Sitaraman discloses that “DHCP servers are used, for example, by Internet Service Providers (ISPs) who typically maintain a ‘pool’ of available IP addresses that can be dynamically assigned to clients upon request.” *Id.* at 31 (citing Ex. 1007, 3:64–4:1, 6:63–66).

Petitioner contends that under the proposed Baig-Laidlaw-Sitaraman combination “the IP address of access point 106 (which includes the router and modem) would have been dynamically assigned by a DHCP server.” *Id.* at 32. According to Petitioner, one of ordinary skill in the art would have been motivated to combine these teachings for multiple reasons including the fact that “dynamic IP address assignment makes more efficient use of available IP addresses because dynamic addresses can be temporarily used (leased) by devices while they are needed, and then recycled for reuse by other devices.” *Id.* at 33 (citing Ex. 1002 ¶ 117). In addition, it is alleged that this combination would have led to cost savings and a more robust ability to withstand attacks by malicious parties. *Id.* (citing Ex. 1002 ¶ 118).

Finally, Petitioner argues that Baig’s content server determines the association between mobile devices and then transmits information to the mobile devices in the vicinity-based community. *Id.* at 40–41. Petitioner contends that the first and second mobile devices are logged into the same hotspot and the act of sending a webpage to the second mobile device teaches the recited “tak[ing] an automatic action with respect to a second of the associated Internet-accessing electronic devices.” *Id.* at 42. Petitioner explains that this is true because the webpage would have to be updated for all of the mobile devices as devices join the community. *Id.* at 43.

Petitioner notes that Baig is not clear as to when or how this information is updated and thus, directs us to Hahn. *Id.* According to Petitioner, Hahn “describes well-known features for automatically updating webpages.” *Id.* at 47. Hahn states that “there are times in which it is desirable to display information which can be updated automatically” and goes on to describe two methods for automatic updating. *Id.* at 48. Petitioner asserts that one of ordinary skill in the art would have applied the methods described in Hahn to Baig in order to keep users up-to-date regarding information about users in their vicinity group. *Id.* at 48 (citing Ex. 1002 ¶¶ 146–147).

Based on the current record, we find Petitioner’s argument and evidence to be persuasive. Petitioner provides detailed explanation as to where the asserted references teach the limitations of claim 1 and explanation as to why and how one of ordinary skill in the art would have combined the teachings of the references. As noted above, this analysis applies equally to claims 13 and 22 as well. In addition, as will be explained below, on the current record, Patent Owner’s assertions do not persuade of any insufficiency in Petitioner’s challenges.

Patent Owner argues that Petitioner’s challenges must fail because they do not meet the limitations of claim 1(b). Prelim. Resp. 7–16. Specifically, Patent Owner contends that Petitioner’s arguments do not account for the requirement that the determination that two or more devices separately accessed the Internet through a router happen “during a predetermined period of time.” *Id.* at 7. According to Patent Owner, “[m]erely determining that the two devices have accessed the Internet via a common IP address is insufficient. The system must also determine the temporal aspect by (a) knowing the predetermined period of time and

(b) assessing whether or not the accesses occurred within that predetermined period of time period.” *Id.* at 7–8.

Patent Owner directs us to a passage from the ’878 specification that discusses sampling the common IP address on a periodic basis (“e.g., every 1, 5, or 10 minutes, or some other suitable interval”). *Id.* at 8 (quoting Ex. 1001, 16:12–45). Patent Owner also directs us to a passage from the ’878 specification in which “[o]nline site 50 periodically reports to CAS 40 (as in FIG. 10) all IP addresses from which the online site was accessed during some preceding period, along with the corresponding times and dates. The frequency and time periods of the online site’s reporting can be similar to those of the STB reporting.” *Id.* at 9 (quoting Ex. 1001, 16:30–45).

Patent Owner contends that Petitioner addresses the “predetermined period of time” limitation “in isolation, divorced from any ‘determination’ performed by its proposed combination.” *Id.* at 11. According to Patent Owner, Petitioner’s reliance on DHCP “‘lease’ time” is insufficient. *Id.*

At most, this is an assertion that the accesses of the two devices via a common IP address might have occurred during some ‘predetermined period of time.’ But it is *not* an assertion that the computer system in Petitioner’s combination ever makes such a determination. There is no allegation, as the claim requires, that the computer system ‘*determine[s]*’ that the two or more Internet-accessing electronic devices have separately accessed the Internet through a router of the LAN *during a predetermined period of time* via a common IP address.’ *Id.* at 11–12.

We are not persuaded by Patent Owner’s argument. Petitioner sufficiently shows that the combined teachings would have taught the recited determination during a predetermined period of time. As noted above, Petitioner relies on Baig to teach the required determination that the

electronic devices have accessed a common LAN. *See* Pet. 18. Petitioner further relies on Sitaraman to teach the required dynamic IP addresses. *Id.* at 31. Petitioner notes that Sitaraman teaches that “[i]f the client accepts the offered IP address, ‘the chosen DHCP server sends an acknowledgement with the offered IP address having an associated ‘lease’ time,’ which can be renewed by the client upon request.” *Id.* at 31–32 (citing Ex. 1007, 3:42–47). Petitioner explains that “the IP address of the access point 106 would have been a dynamically assigned IP address with a DHCP ‘lease’ time during which the address remains valid.” *Id.* at 37–38 (citing Ex. 1007, 3:42–51). Thus, Petitioner argues that the mobile device “would thus have accessed the Internet via access point 106 during ‘a predetermined period of time via a common IP address,’ *i.e.*, during the lease time that the dynamic IP address assigned to access point 106 remains valid.” *Id.* at 38 (citing Ex. 1002 ¶ 125).

Petitioner directs us to a disclosure in the ’878 specification which it asserts is “entirely consistent” with its mapping of DHCP lease times to the recited “predetermined period of time.” *Id.* (citing Ex. 1001, 4:22–26) (“The assignment of the IP address usually expires after a predetermined period of time.”). Patent Owner argues that that cited portion of the ’878 patent is in the background and merely discusses how DHCP operates and thus, “is not[] remotely about the claimed invention or in the context of the determining step of claim 1[b].” Prelim. Resp. 15. Patent Owner then directs us to passages that it asserts show how the predetermined period of time operates within its claims. *Id.* (citing Ex. 1001, 14:9–15:12, 16:12–48). Patent Owner’s cited portion of the ’878 specification, however, support Petitioner’s assertions. It states that the “time interval can be selected to be

commensurate with a typical or average time interval for dynamic reassignment of the online access IP address by the user's Internet Service Provider."

Patent Owner also argues that Baig does not determine whether the time limitation is met. Prelim. Resp. 14. As stated by Patent Owner, Baig has "no concept of a 'predetermined period of time' and no consideration that the accesses of both devices must be *within* a specified period of time." *Id.* Patent Owner further contends that even if some period of time could be "contrive[d]" from Petitioner's allegations it would be insufficient "because the condition would be met by accident, and *not* as a result of any determination or intentional action performed by the Baig system. That system does not know and is not using the 'predetermined period of time' as part of any determination step." *Id.* at 14–15. Petitioner, however, is arguing that Baig *and Sitaraman* would teach this limitation and is not relying on Baig alone.

The question here is whether one of ordinary skill in the art presented with the teachings of all of the asserted art would have learned of a system that included the recited predetermined period of time. On this record, we are persuaded that Petitioner has sufficiently shown this to be true. As noted above, a person of ordinary skill in the art would have had "bachelor's degree in electrical engineering or computer science, and two years of work experience in the field of network-based computer systems." *See* Pet. 5. On the current record, we are persuaded that such a person would have understood Sitaraman to teach "well-known and industry-standard DHCP techniques" and that such techniques "would have . . . dynamically-assigned IP address with a 'lease' time during which the address remains valid." *See*

Ex. 1002 ¶ 125. Baig used static IP addressing, but, based on the current record, Sitaraman’s teachings would have taught one of ordinary skill in the art to replace those static addresses with Sitaraman’s dynamic addressing, which would introduce the need to for the system to be aware of the lease time in which the dynamic addresses would be valid. As such, a person of ordinary skill in the art would have seen the need to perform the determination step “during that predetermined lease period in which the dynamic IP address of access point 106 was valid.” *Id.* ¶ 126. We are persuaded, for the purposes of this Decision, that this is sufficient to meet the disputed limitation.

Based on the evidence in the present record, we are persuaded that Petitioner has shown sufficiently for purposes of this Decision that the combination of Baig, Laidlaw, Sitaraman, and Hahn teaches or suggests all of the limitations recited in claims 1, 13, and 22.

2. Dependent Claims 2, 8–10, 14, and 19

Petitioner asserts that claims 2, 8–10, 14, and 19 are unpatentable under 35 U.S.C. § 103 as obvious over Baig, Laidlaw, Sitaraman, and Hahn, citing the Declaration of Christopher M. Schmandt for support. Pet. 49–53 (citing Ex. 1002). Patent Owner’s Preliminary Response does not separately address these dependent claims. *See* Prelim. Resp. 16–17.

Based on the evidence in the present record, we are persuaded that Petitioner has shown sufficiently for purposes of this Decision that the combination of Baig, Laidlaw, Sitaraman, and Hahn teaches or suggests all of the limitations recited in claims 2, 8–10, 14, and 19.

*E. Obviousness Over Baig, Laidlaw,
Sitaraman, Hahn, and Xu*

Petitioner asserts that claims 3, 4, 15, and 16 are unpatentable under 35 U.S.C. § 103 as obvious over Baig, Laidlaw, Sitaraman, Hahn, and Xu, citing the Declaration of Christopher M. Schmandt for support. Pet. 54–62 (citing Ex. 1002). Patent Owner’s Preliminary Response does not separately address this ground. *See* Prelim. Resp. 16–17.

Based on the evidence in the present record, we are persuaded that Petitioner has shown sufficiently for purposes of this Decision that the combination of Baig, Laidlaw, Sitaraman, Hahn, and Xu teaches or suggests all of the limitations recited in claims 3, 4, 15, and 16.

*F. Obviousness Over Baig, Laidlaw,
Sitaraman, Hahn, and Gerace*

Petitioner asserts that claims 6, 7, 17, and 18 are unpatentable under 35 U.S.C. § 103 as obvious over Baig, Laidlaw, Sitaraman, Hahn, and Gerace, citing the Declaration of Christopher M. Schmandt for support. Pet. 63–67 (citing Ex. 1002). Patent Owner’s Preliminary Response does not separately address this ground. *See* Prelim. Resp. 16–17.

Based on the evidence in the present record, we are persuaded that Petitioner has shown sufficiently for purposes of this Decision that the combination of Baig, Laidlaw, Sitaraman, Hahn, and Gerace teaches or at least suggests all of the limitations recited in claims 6, 7, 17, and 18.

*G. Obviousness Over Baig, Laidlaw,
Sitaraman, Hahn, Xu, and Gerace*

Petitioner asserts that claims 11, 12, 20, 21, and 23 are unpatentable under 35 U.S.C. § 103 as obvious over Baig, Laidlaw, Sitaraman, Hahn, Xu, and Gerace, citing the Declaration of Christopher M. Schmandt for support.

Pet. 67–68 (citing Ex. 1002). Patent Owner’s Preliminary Response does not separately address this ground. *See* Prelim. Resp. 16–17.

Based on the evidence in the present record, we are persuaded that Petitioner has shown sufficiently for purposes of this Decision that the combination of Baig, Laidlaw, Sitaraman, Hahn, Xu, and Gerace teaches or at least suggests all of the limitations recited in claims 11, 12, 20, 21, and 23.

III. CONCLUSION

For the foregoing reasons, we determine that the arguments and evidence presented in the Petition establish that there is a reasonable likelihood that Petitioner would prevail with respect to at least one of challenged claims 1–4 and 6–23 of the ’878 patent. We therefore institute trial on all challenged claims and grounds raised in the Petition.

At this stage of the proceeding, we have not made a final determination as to the patentability of any challenged claim or as to the construction of any claim term. Any final determination will be based on the record developed during trial. We place Patent Owner on express notice that any argument not asserted in a timely-filed Response to the Petition, or in another manner permitted during trial, may be deemed forfeited, even if that argument was presented in the Preliminary Response.

IV. ORDER

In consideration of the foregoing, it is hereby:

ORDERED that, pursuant to 35 U.S.C. § 314(a), an *inter partes* review is hereby instituted for the asserted grounds:

Claim(s) Challenged	35 U.S.C. §	Reference(s)/Basis
1, 2, 8–10, 13, 14, 19, 22	103	Baig, Laidlaw, Sitaraman, Hahn

Claim(s) Challenged	35 U.S.C. §	Reference(s)/Basis
3, 4, 15, 16	103	Baig, Laidlaw, Sitaraman, Hahn, Xu
6, 7, 17, 18	103	Baig, Laidlaw, Sitaraman, Hahn, Gerace
11, 12, 20, 21, 23	103	Baig, Laidlaw, Sitaraman, Hahn, Xu, Gerace

FURTHER ORDERED that, pursuant to 35 U.S.C. § 314(c) and 37 C.F.R. § 42.4, notice is hereby given of the institution of a trial; the trial will commence on the entry date of this Decision.

IPR2023-01281
Patent 10,715,878 B2

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