UNITED STATES PATENT AND TRADEMARK OFFICE

Paper: 10

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BEFORE THE PATENT TRIAL AND APPEAL BOARD

UNIFIED PATENTS INC., Petitioner,

v.

KAMATANI CLOUD, LLC, Patent Owner.

Case IPR2017-01370 Patent 6,873,940 B1

Before DAVID C. McKONE, BARBARA A. PARVIS, and MELISSA A. HAAPALA, *Administrative Patent Judges*.

PARVIS, Administrative Patent Judge.

DECISION
Granting Institution of *Inter Partes* Review 37 C.F.R. § 42.108

I. INTRODUCTION

Unified Patents Inc. ("Petitioner") filed a Petition for *inter partes* review of claims 1, 2, 5, 7–13, 15–18, 21, 23–28, 30–32, 34, 35, and 38–41 ("the challenged claims") of U.S. Patent No. 6,873,940 B1 (Ex. 1001, "the '940 patent"). Paper 1 ("Pet."). Kamatani Cloud, LLC ("Patent Owner") filed a Preliminary Response. Paper 9 ("Prelim. Resp.").

We apply the standard set forth in 35 U.S.C. § 314(a), which requires demonstration of "a reasonable likelihood that the petitioner would prevail with respect to at least 1 of the claims challenged in the petition." Upon consideration of the Petition and Preliminary Response, we conclude Petitioner demonstrates a reasonable likelihood of prevailing in demonstrating the unpatentability of all challenged claims. Accordingly, we grant Petitioner's request and institute an *inter partes* review of all challenged claims.

A. Related Matters

The parties state that the '940 patent was asserted in *Kamatani Cloud LLC v. Animetrics, Inc.*, No. 1:16-cv-05492 (SDNY), which was terminated September 12, 2016. Pet. 2; Paper 5, 2.

¹ Petitioner omits claim 16 from certain listings of challenged claims (*see*, *e.g.*, Pet. 4), but Petitioner provides contentions challenging claim 16 (*see*, *e.g.*, *id.* at 62–63, 74). Accordingly, we treat Petitioner's omission of claim 16 as a typographical error.

B. The '940 patent

The '940 patent is directed to a measurement service system for carrying out remote measurements. Ex. 1001, 1:7–11. Figure 3 of the '940 patent is reproduced below.

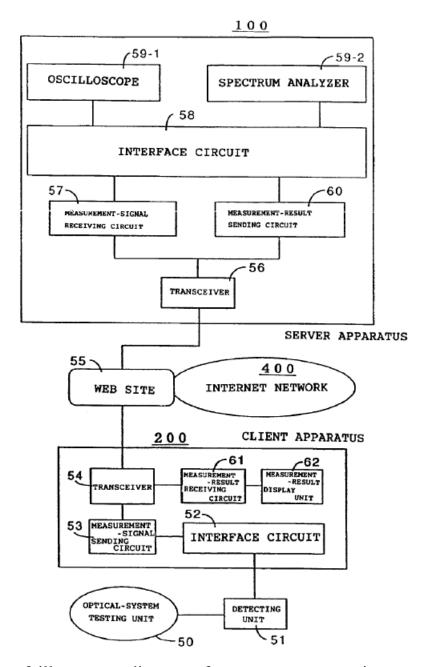


Figure 3 illustrates a diagram of a measurement service system.

As shown in Figure 3 above, the system includes client apparatus 200 having optical-system testing unit 50, which obtains measurement data, and detecting unit 51, which detects the measurement data. *Id.* at 5:22–26. Interface circuit 52 captures the detected measurement data as detected signals, and then modulates and codes the detected signals for transmission. *Id.* at 5:27–31. The modulated detection signals are transmitted to Internet 400 via Web Site 55. *Id.* at 5:33–34.

The detection signals are received by server apparatus 100 and demodulated by measurement-signal receiving circuit 57. *Id.* at 5:66–6:2. The detection signals are transmitted to interface circuit 58, which selects a desired one of measurement instruments, specifically, oscilloscope 59-1 or spectrum analyzer 59-2. *Id.* at 6:3–7. A desired measuring instrument in server apparatus 100 also may be selected on Web Site 55. *Id.* at 5:41–45. Server apparatus 100 also detects whether the measurement data are capable of being measured by a measuring instrument in server apparatus 100, and notifying whether the measurement service is available. *Id.* at 5:46–50.

C. Illustrative Claim

Petitioner challenges claims 1, 2, 5, 7–13, 15–18, 21, 23–28, 30–32, 34, 35, and 38–41 of the '940 patent. Pet. 4. Claims 1, 17, 32, and 38–41 are independent claims. Claims 2, 5, 7–13, 15, 16, 18, 21, 23–28, 30, 31, 34, and 35 depend, directly or indirectly, from claims 1, 17, and 32. Independent claim 1, reproduced below, is illustrative of the claimed subject matter:

1. A measuring service system comprising a server apparatus and a client apparatus connected to each other through an interactive communication line, such that the client

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apparatus sends measurement data, input thereto from a measured medium, to the server apparatus through the interactive communication line, while the server apparatus executes measurement processing on the basis of the measurement data to send data on the measurement processing results to the client apparatus through the interactive communication line, wherein

said client apparatus comprises client-side modulation means for modulating the measurement data into signals suitable for transmission, and client-side demodulation means for demodulating the data on the measurement processing results into signals suitable for processing on said client apparatus, and

said server apparatus comprises at least one measurement means capable of executing measurement processing on the basis of the measurement data, means for detecting whether the measurement data are capable of being measured by any measurement means in the said server apparatus, and notifying whether the measurement processing is available and server-side modulation means for modulating the data on the measurement processing results into signals suitable for transmission.

Id. at 7:40-64.

D. Asserted Grounds of Unpatentability

Petitioner asserts that the challenged claims are unpatentable, under 35 U.S.C. § 103(a), based on the following grounds (Pet. 4):

References	Challenged Claims
Sunshine ² and	1, 2, 7–11, 13, 15–18, 23–26, 28,
Miyajima ³	30, 31, and 38–41
Sunshine, Miyajima,	16, 31 ⁵ , 32, 34, and 35
Ezekiel ⁴	10, 31, 32, 34, and 33
Sunshine, Miyajima,	5, 12, 21, and 27
Nathanson ⁶	J, 12, 21, and 27

As support, Petitioner proffers a Declaration of Mr. Arthur Zatarain, who has been retained by Petitioner for the instant proceeding. Ex. $1007 \, \P \, 1$.

II. DISCUSSION

A. Claim Construction

Petitioner provides proposed claim constructions for "interactive communication line" and for the means-plus-function limitations recited in the challenged claims. Pet. 8–13. Patent Owner agrees to Petitioner's proposed constructions, except for the "measurement means" and "means for detecting" limitations.⁷ Prelim. Resp. 8–14, 24–25. For purposes of this Decision, we adopt Petitioner's unchallenged proposals because Petitioner

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² U.S. Patent No. 6,606,566 B1, issued Aug. 12, 2003 (Ex. 1004) ("Sunshine").

³ U.S. Patent Application No. 2002/0083128 A1, published June 27, 2002 (Ex. 1005) ("Miyajima").

⁴ U.S. Patent No. 5,790,977, issued Aug. 4, 1998 (Ex. 1006) ("Ezekiel").

⁵ See supra note 9.

⁶ U.S. Patent No. 6,263,268 B1, issued July 17, 2001 (Ex. 1010) ("Nathanson").

⁷ Although Patent Owner states it agrees with Petitioner's proposed construction for the "means for detecting," it presents a different construction in its arguments. Prelim Resp. 12, 24–25.

identifies sufficiently persuasive support in the '940 patent specification at this stage in the proceeding. *See Wellman, Inc. v. Eastman Chem. Co.*, 642 F.3d 1355, 1361 (Fed. Cir. 2011) ("[C]laim terms need only be construed 'to the extent necessary to resolve the controversy'") (quoting *Vivid Techs., Inc. v. Am. Sci. & Eng'g, Inc.*, 200 F.3d 795, 803 (Fed. Cir. 1999)). We address the parties' contentions regarding the "measurement means" and "means for detecting" limitations below.

1. Principles of Law

In an *inter partes* review, we construe claim terms in an unexpired patent according to their broadest reasonable construction in light of the specification of the patent in which they appear. 37 C.F.R. § 42.100(b). Limitations with the language "means" or "means for" are presumed to invoke 35 U.S.C. § 112, sixth paragraph. See Williamson v. Citrix Online, LLC, 792 F.3d 1339, 1348–49 (Fed. Cir. 2015) (en banc in relevant part) ("use of the word 'means' creates a presumption that § 112, ¶ 6 applies."); see also In re Donaldson Co., 16 F.3d 1189, 1193 (Fed. Cir. 1994) ("[P]aragraph six applies regardless of the context in which the interpretation of means-plus-function language arises, i.e., whether as part of a patentability determination in the PTO or as part of a validity or infringement determination in a court.").

The sixth paragraph of 35 U.S.C. § 112 provides that

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⁸ Section 4(c) of the Leahy-Smith America Invents Act, Pub. L. No. 112–29, 125 Stat. 284 (2011) ("AIA") re-designated 35 U.S.C. § 112 ¶ 6, as 35 U.S.C. § 112(f). Because the '940 patent has a filing date before September 16, 2012, the effective date of § 4(c) of the AIA, we will refer to the pre-AIA version of 35 U.S.C. § 112.

[a]n element in a claim for a combination may be expressed as a means or step for performing a specified function without the recital of structure, material, or acts in support thereof, and such claim shall be construed to cover the corresponding structure, material, or acts described in the specification and equivalents thereof.

Where a challenged claim contains a means-plus-function limitation under 35 U.S.C. § 112, sixth paragraph, the Petitioner "must identify the specific portions of the specification that describe the structure, material, or acts corresponding to each claimed function." 37 C.F.R. § 42.104(b)(3).

2. "measurement means"

We turn to the parties' contentions regarding the "measurement means" limitation. Petitioner contends "[t]he function for the server's 'measurement means' is 'executing measurement processing on the basis of the measurement data." Pet. 10. Regarding the corresponding structure, Petitioner contends

[t]he following items are identified in the '940 Patent as performing this function: "measuring instrument" (Fig. 1, Fig. 2, 3:51–53, 4:49–52, 5:6–10, 5:66–6:7, 6:33–40, 6:65–7:9), "medical diagnostic equipment" (1:17–25), "chemical analyzer" (1:17–25), "oscilloscope" (Fig. 3, 1:17–25, 5:66–6:7, 6:33–40), "spectrum analyzer" (Fig. 3, 1:17–25, 5:66–6:7, 6:33–40), and "[automobile] tester" (Fig. 4, 1:17–25, 6:65–7:9).

Id.

Patent Owner contends "[t]he function for the server's 'measurement means' is 'to execute measurement processing for the <u>externally</u> provided measurement data to obtain data on the measurement processing results'." Prelim. Resp. 9. Patent Owner agrees with Petitioner's identification of corresponding structures in the '940 patent specification. *Compare id.* at 9–

10, with Pet. 10. Patent Owner contends its proposal regarding the function is correct because "in operation, the invention of the '940 patent, raw data signals for measurement are acquired through the measurement medium and detected by the detector block." Prelim Resp. at 10. Patent Owner also contends "[t]he client then routes the external raw data signals through the server (the cloud)." *Id.* Patent Owner provides citations to the '940 patent specification that Patent Owner contends support its proposal. *Id.* at 10–12 (citing Ex. 1001, 3:34–36, 3:52–54, 4:40–43, 4:49–52, 6:52–67). Patent Owner, however, does not argue that these additional citations describe additional corresponding structure.

Based on the record before us at this juncture of the proceeding, we are not persuaded that portions of the '940 patent specification cited by Patent Owner support sufficiently Patent Owner's proposal. For instance, we do not find a description of "external raw" signals in the cited portions. *Id.* at 10. Thus, Patent Owner does not present persuasive evidence suggesting Petitioner's identification of function (which tracks the claim language itself) is incorrect. Moreover, according to Section 112, sixth paragraph, "such claim shall be construed to cover the corresponding structure, material, or acts described in the specification and equivalents thereof." Here, its disagreement as to function notwithstanding, Patent Owner expressly agrees with Petitioner's identification of corresponding structure. Accordingly, for purposes of this Decision, we are persuaded to adopt Petitioner's proposals for function and corresponding structure of the "measurement means" limitation.

3. "means for detecting"

Claim 1 recites "means for detecting whether the measurement data are capable of being measured by any measurement means in the said server apparatus, and notifying whether the measurement processing is available." Ex. 1001, 7:58–62. Petitioner contends that the function of this limitation is "detecting whether the measurement data [are/is] capable of being measured by any measurement means in [the said/the] server apparatus" and identifies as corresponding structure "[a] server computer coupled to an instrument through an interface" as shown in Figures 1–4 and column 5, line 40–column 6, line 8 of the '940 patent. Pet. 10–11.

Patent Owner contends that "all of the independent claims (1, 17, 32 and 38–41), specify a detecting feature in which the measuring capability of a remote measuring device is detected . . . and/or notifying feature which indicates whether such device is available to effectuate a measurement." Prelim. Resp. 17–18. Consistent with Patent Owner's contention, claim 39 includes a similar means-plus-function limitation, with only minor grammatical differences that do not impact our analysis. Ex. 1001, 10:40–60. Additionally, other claims, such as claims 32, 38, 40, and 41 include similar recitations, but not in means-plus-function format. *Id.* at 9:55–10:3, 10:23–39, 10:61–11:13, 11:14–12:13.

Although Patent Owner indicates that it "agrees with Petitioner's proposed construction of the term and the identified corresponding structure" (Prelim. Resp. 12), in its arguments distinguishing Miyajima, regarding the detecting and notifying means Patent Owner contends that Petitioner "improperly attempts to construe two admittedly different claim terms[] as having the same meaning" (*id.* at 24). Patent Owner's contention

pertains to emphasized language in the following recitation: "means for detecting whether the measurement data are *capable* of being measured by any measurement means in the said server apparatus, and notifying whether the measurement processing is *available*." Ex. 1001, 7:58–62 (emphasis added). According to Patent Owner, "capable does not mean merely 'available," but instead, the measurement instrument must have "the appropriate <u>functional capability</u> for a particular measurement requirement (*e.g.*, choosing the right instrument such as between an oscilloscope, frequency analyzer, multimeter, *etc.*)." Prelim. Resp. 25.

In its claim construction analysis, Petitioner identifies portions of the '940 patent specification that Petitioner contends describes the corresponding structure for the means for detecting. Pet. 11 (citing Ex. 1001, Figs. 1–4). The most relevant of these portions is reproduced below:

The server computer may also have the functions of detecting whether the measurement data are capable of being measured by *any measuring instrument* in the server apparatus 100, and notifying whether the measurement service is available.

Further the measurement service system may be such that the *operating state* of each measuring instrument can be confirmed on the Web site 55.

Ex. 1001, 5:46–54 (emphases added). Patent Owner agreed to Petitioner's claim construction contentions in this regard. Prelim. Resp. 12. At this stage in the proceeding, we are not persuaded that this portion of the '940 patent specification requires a measurement instrument have an appropriate functional capability for a particular measurement requirement.

In its analysis of Miyajima, Patent Owner identifies other portions of the '940 patent specification that Patent Owner contends supports its contentions. *Id.* at 25–28 (citing Ex. 1001, 1:62–64, 4:49–56, 6:3–17). Patent Owner, for example, points to the following "[i]t should be noted that the selection of a measuring instrument 38 [one of measurement instruments 38-1 to 38-X] might be made according to the type of automobile, . . . or the type of automobile-mounted equipment." Ex. 1001, 4:49–56. Additionally, Patent Owner points to the following: "[u]pon transmission of the detection signals (measurement data), the measurement-result sending circuit 53 of the client apparatus 200 may send the detection signals with adding thereto a coded data indicative of which measuring instrument should be selected." Ex. 1001, 6:3–17.

Although we agree with Patent Owner to the extent that Patent Owner contends that the '940 patent specification describes different types of measuring equipment and selecting particular measuring equipment, based on the record before us at this stage of the proceeding, we are not persuaded that these portions of the '940 patent specification require narrowly construing the function of "detecting whether the measurement data are capable of being measured by any measurement means" (emphasis added). At this stage of the proceeding, we decline to formulate a construction that differs from that agreed to by the parties. Pet. 10–11; Prelim. Resp. 12.

B. Principles of Law (Obviousness)

A patent claim is unpatentable if the differences between the claimed subject matter and the prior art are such that the subject matter, as a whole, would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.

35 U.S.C. § 103(a). The question of obviousness is resolved on the basis of

underlying factual determinations, including: (1) the scope and content of the prior art; (2) any differences between the claimed subject matter and the prior art; (3) the level of skill in the art; and (4) objective evidence of nonobviousness, i.e., secondary considerations. *See Graham v. John Deere Co.*, 383 U.S. 1, 17–18 (1966).

C. Person of Ordinary Skill in the Art

Petitioner proposes that a person of ordinary skill in the art would have had a degree in computer science, electrical engineering, or computer engineering, or equivalent experience, and at least two years of experience in remote monitoring and control systems. Pet. 7 (citing Ex. 1007 ¶ 16). Patent Owner agrees with Petitioner's proposal. Prelim. Resp. 8.

D. Obviousness over Sunshine and Miyajima

Petitioner contends each of claims 1, 2, 7–11, 13, 15–18, 23–26, 28, 30, 31, and 38–41 is unpatentable, under 35 U.S.C. § 103(a), over Sunshine and Miyajima. Pet. 14–71. Relying on the testimony of Mr. Zatarain, Petitioner explains how the combination of Sunshine and Miyajima teaches all the claim limitations. *Id.* (citing Ex. 1007).

1. Overview of Sunshine

Sunshine is directed to a computer code for detecting and transmitting sensory data from one portable device to another for analytic purposes.

Ex. 1004, 1:16–20. Figure 1 of Sunshine is reproduced below.

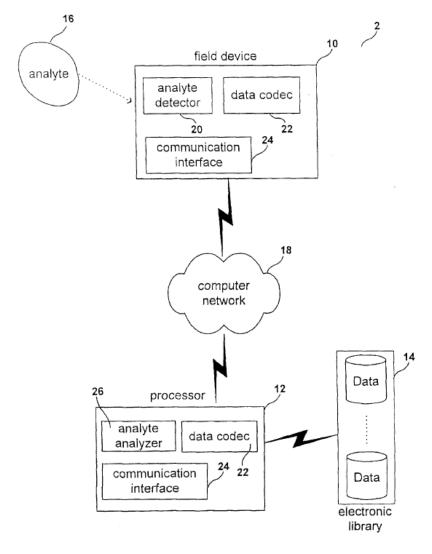


Fig. 1

Figure 1 illustrates a block diagram of a detection and transmission system.

As shown in Figure 1 above, detection and transmission system 2 includes field device 10 and processor 12. *Id.* at 4:23–24. Field device 10 is a portable, handheld device (*id.* at 4:64–67) and includes analyte detector 20 and data coder/decoder ("codec") 22 (*id.* at 4:31–32). Analyte detector 20 detects the presence of analyte 16 and generates sensory data corresponding to a signature specific to the detected analyte. *Id.* at 4:33–37. Data codec 22

receives data from analyte detector 20, encodes and formats the data, and relays the data to computer network 18. *Id.* at 4:46–51.

A data codec in processor 12 receives data from field device 10 and processes or decodes that data and then sends it to analyte analyzer 26. *Id.* at 5:25–28. Analyte analyzer 26 compares data received from field device 10 with data retrieved from database 14 to identify the detected analyte. *Id.* at 5:35–39.

2. Overview of Miyajima

Miyajima is directed to an automatic remote electronic instrument connecting system. Ex. 1005 ¶ 1. Figure 1 of Miyajima is reproduced below.

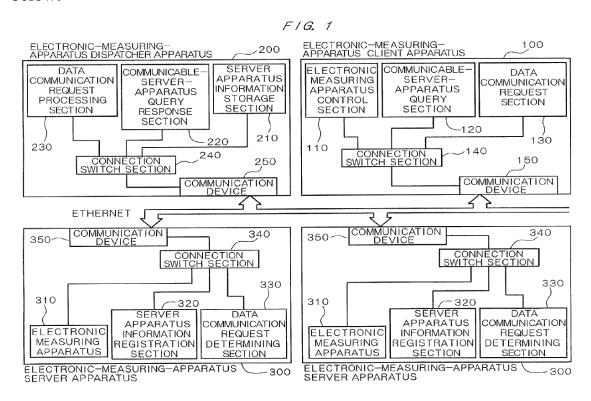


Figure 1 illustrates configuration of an electronic-measuring apparatus.

As shown in Figure 1 above, the electronic-measuring apparatus includes client apparatus 100 and server apparatus 300. *Id.* ¶ 35. Server

apparatus 300 includes measuring apparatus 310 and registration section 320. *Id.* ¶ 38. After power to electronic measuring apparatus 310 has been turned on, registration section 320 creates a unique registration (identification (ID) number) for measuring apparatus 310. *Id.* ¶¶ 38, 40.

3. Discussion of Claim 1

We begin our analysis with independent claim 1. Claim 1 is directed to a measuring service system comprising a client apparatus for modulating measurement data and a server apparatus comprising at least one measurement means for executing measurement processing on the basis of measurement data and a means for detecting and notifying whether measurement processing is available. Ex. 1001, 7:40–64. For most of the limitations recited in claim 1, Petitioner points to Sunshine's teachings relating to the embodiment illustrated in Figure 1, reproduced and discussed in the summary above. Pet. 14–50 (citing, *e.g.*, Ex. 1004, Abstract, 2:31–3:30, 4:11–5:40, Fig. 1; Ex. 1007 ¶¶ 35, 40–48, 81–101). For the detecting and notifying means, Petitioner points to Miyajima's teachings relating to determining whether Miyajima's measuring apparatus 310 has been powered on and is available to process data, and if so, creating registered information including the ID number. *Id.* at 38–47 (citing Ex. 1005 ¶¶ 5, 6, 12, 13, 38, 40, 47, 58).

Consistent with Petitioner's contentions (*id.*) and as set forth in the summary above, Sunshine teaches capturing data for an unknown analyte using a field device at a first geographic location and then transmitting the captured analyte data to a processor at a second geographic location.

Ex. 1004, 2:44–48. Also consistent with Petitioner's contentions (Pet. 14–

50), Sunshine teaches detection and transmission system 2, which includes field device 10 and processor 12. Ex. 1004, 4:23–24. Sunshine's field device 10 is a portable, handheld device (*id.* at 4:64–67) and includes analyte detector 20, which detects the presence of analyte 16. *Id.* at 4:31–37. Sunshine's processor 12 receives data from field device 10 and processes or decodes that data and then sends it to analyte analyzer 26. *Id.* at 5:25–28. Analyte analyzer 26 compares data received from field device 10 with data retrieved from database 14 to identify the detected analyte. *Id.* at 5:35–39.

Patent Owner contends (1) the asserted prior art does not teach certain limitations, including the detecting and notifying means (Prelim. Resp. 17–29), and (2) a person having ordinary skill in the art would not have combined Sunshine and Miyajima (*id.* at 29–31).

We turn to Patent Owner's first contention that the asserted prior art, i.e., Miyajima does not teach certain limitations, including the detecting and notifying means. *Id.* at 22–29. Patent Owner's contentions regarding the detecting and notifying means limitation pertain to Patent Owner's proposed construction. *Id.* For the reasons given above with respect to claim construction, at this stage of the proceeding, we decline to formulate a construction that differs from that agreed to by the parties. Pet. 10–11; Prelim. Resp. 12. Patent Owner also contends that "[b]ecause no raw data can travel over the network as in the '940 patent, the dispatch function in Miyajima is incapable of dispatching raw data for measurement processing based on device capability." Prelim. Resp. 24. Patent Owner's contention is based on its proposed construction for the measurement means limitation, which we also decline to adopt at this stage of the proceeding for the reasons given above.

Additionally, based on the record before us at this juncture, we find that Petitioner has shown sufficiently that the Miyajima and Sunshine teach structures that are the same as the structures corresponding to the detecting and notifying means, as well as the measurement means. For instance, the parties agree that the corresponding structure for the detecting and notifying means is "[a] server computer coupled to an instrument through an interface." Pet. 11 (citing Ex. 1001, 5:40–6:8, Figs. 1–4); Prelim. Resp. 12– 13. Petitioner points to Miyajima's teaching of a server connected to an instrument through a dispatcher. Pet. 38–47 (citing e.g., Ex. 1005 ¶¶ 5, 6, 12, 13, 47, 58, Figs. 1–12). We determine that Petitioner shows sufficiently, at this stage of the proceeding and on the current record, that the server performs the recited detecting function through its assertion that Miyajima determines whether the instrument is available to process data. Id. (citing ¶ 47). Regarding the measurement means, the parties agree that the corresponding structure includes "medical diagnostic equipment' (1:17-25), 'chemical analyzer' (1:17-25), 'oscilloscope' (Fig. 3, 1:17-25, 5:66-6:7, 6:33-40), 'spectrum analyzer' (Fig. 3, 1:17-25, 5:66-6:7, 6:33-40), and '[automobile] tester' (Fig. 4, 1:17-25, 6:65-7:9)." Pet. 10; Prelim. Resp. 9– 10. Petitioner points to Sunshine's analyte (chemical) analyzer and Miyajima's spectrum analyzer. Pet. 33–37 (citing e.g., Ex. 1004, 5:35–40, 5:49–6:54, Fig. 1; Ex. 1004 ¶ 44).

We now turn to Patent Owner's contention that a person having ordinary skill in the art would not have combined Sunshine and Miyajima (Prelim. Resp. 29–31). Patent Owner describes Sunshine and Miyajima as "fundamentally different" and "fundamentally incompatible" because of a "basic architectural difference." *Id.* at 30. Patent Owner, more specifically,

contends that "the *Miyajima* system merely allows for the remote control" of "an 'instrument' in *Miyajima* that represents the entire measurement system in one location." *Id*.

Petitioner contends that Sunshine and Miyajima "are in the same field of working with measurements in a client/server environment" and "[b]oth recite performing measurement processing at a server in response to a request from a client." Pet. 16 (citing Ex. 1004, [57], Fig. 1; Ex. 1005, [57], ¶ 9, Fig. 1; Ex. 1007 ¶¶ 50–57). Petitioner additionally contends that a person having ordinary skill in the art would have been motivated to add Miyajima's teachings regarding detecting and notifying to Sunshine because Miyajima explains that this technique provides reliability, provides for faster operation by eliminating a step, and improves accuracy. *Id.* at 45–46 (citing Ex. 1005 ¶¶ 10, 11, 13).

At this juncture of the proceeding, having reviewed the Petition and Preliminary Response, and the evidence cited therein, we are persuaded that Petitioner has provided sufficient articulated reasoning for institution. For instance, consistent with Petitioner's contentions, both Sunshine and Miyajima pertain to remote control or processing and both involve analyzing measurement data. Ex. 1004, [57]; Ex. 1005, [57].

Accordingly, on this record, we determine that Petitioner has shown sufficient basis for instituting trial on the ground that claim 1 is unpatentable, under 35 U.S.C. § 103(a), over Sunshine and Miyajima.

4. Discussion of Independent Claims 17 and 38–41

Independent claims 17 and 38–41 are similar to claim 1. Petitioner's showing with respect to claims 17 and 38–41 is similar to its showing with

respect to claim 1. *Compare* Pet. 63–65, 67–72, *with id.* at 16–50. Patent Owner does not argue these claims separately. Prelim. Resp. 17–20.

For the reasons given and on the record before us at this juncture, we determine that Petitioner has shown sufficient basis for instituting trial on the ground that claims 17 and 38–41 are unpatentable, under 35 U.S.C. § 103(a), over Sunshine and Miyajima.

5. Discussion of Dependent Claims 2, 7–11, 13, 15, 18, 23–26, 28, and 30

We turn to Petitioner's contentions regarding dependent claims 2, 7–11, 13, 15, 18, 23–26, 28, and 30.9 Petitioner asserts that the combination of Sunshine and Miyajima teaches the further limitations recited in claims 2, 7–11, 13, and 15. For example regarding the requirement that the measurement data are data obtained by operating physical and chemical equipment or are medical diagnostic data, as recited in claims 2 and 13, respectively, consistent with Petitioner's contentions (Pet. 50, 51, 59), Sunshine teaches using its techniques "to detect chemical leaks." Ex. 1004, 9:29–30; *see also id.* at 1:56–2:6 (teaching that such techniques are useful "in a hospital/medical environment" or "in a foundry or a home" to detect "a gas leak."). With respect to the means for adding coded information for specifying the measurement means recited in claim 7, and the further requirement of selecting the measurement means based on that data, recited

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⁹ Petitioner identifies claims 16 and 31 as also being challenged on the basis of Sunshine and Miyajima ("**Ground 1**"). *See, e.g.*, Pet. 4, 14. For claims 16 and 31, Petitioner additionally argues that the claims would have been obvious over the teachings of Sunshine and Miyajima in combination with the teachings of Ezekiel. We discuss Petitioner's contentions regarding claims 16 and 31 as part of our discussion of Ground 2 below.

in claim 8, consistent with Petitioner's contentions (Pet. 51–57), Miyajima teaches "a data communication request specifying the name of this electronic-measuring-apparatus server apparatus 300" (Ex. 1005 ¶ 41) and that "the electronic-measuring-apparatus client apparatus 100 can automatically select an actually available electronic-measuring-apparatus server apparatus 300" (id. ¶ 42). At this stage, we also are persuaded sufficiently by Petitioner's other contentions regarding dependent claims 7 and 8. Pet. 51–57 (citing, e.g., Ex. 1005 ¶¶ 4, 36, 41, 42, 44, 51, 52, 70, 71, 72, Figs. 1–12).

Regarding the further requirement that the interactive communications line comprises the Internet network, a switched line or a private line, recited in claim 9, or a wireless communication channel, recited in claim 10, consistent with Petitioner's analysis (Pet. 57) Sunshine teaches communication over the Internet and wireless communication (Ex. 1004, 2:31–37, 4:63–5:13, 7:26–45, 7:46–51). Additionally, regarding the further requirement that the system comprises a detecting unit, recited in claim 11, consistent with Petitioner's analysis (Pet. 57–59), Sunshine teaches analyte detector 20 (Ex. 1004, 1:24–30, 2:39–55, 4:25–32, 4:46–55, 4:63–5:13, 8:66–9:8, Figs. 1, 2, 6–8). Regarding the further requirement that the system comprises a display means recited in claim 15, consistent with Petitioner's analysis (Pet. 59-62), Sunshine teaches that the field device is a Palm or Handspring handheld device (see, e.g., Ex. 1004, 4:63–5:13). A person having ordinary skill in the art would have understood that the Palm and Handspring handheld devices interacted with the user via a display unit. Ex. 1007 ¶ 103 (citing Ex. 1023, 3–5).

The further recitations of claims 18, 23–26, 28, and 30 are similar to those of claims 2, 7–11, 13, and 15 and any of the minor differences do not impact our analysis. Petitioner's showing with respect to claims 18, 23–26, 28, and 30 is similar to its showing with respect to claim 1. *Compare* Pet. 63–65, 67–72 *with id.* at 16–50.

At this juncture, Patent Owner does not argue dependent claims 2, 7–11, 13, 15, 18, 23–26, 28, and 30 separately. Prelim. Resp. 17, 31. For the reasons given and on the record before us, we determine that Petitioner has shown sufficient basis for instituting trial on the ground that claims 2, 7–11, 13, 15, 18, 23–26, 28, and 30 are unpatentable, under 35 U.S.C. § 103(a), over Sunshine and Miyajima.

6. Conclusion

Having reviewed the Petition and Preliminary Response, and the evidence cited therein, based on the record before us at this juncture, we are persuaded that Petitioner has established a reasonable likelihood that it would prevail in showing that each of claims 1, 2, 7–11, 13, 15, 17, 18, 23–26, 28, 30, and 38–41 is unpatentable, under 35 U.S.C. § 103(a), over Sunshine and Miyajima.

E. Obviousness over Sunshine, Miyajima, and Ezekiel

Petitioner contends claims 16, 31,¹⁰ 32, 34, and 35 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine, Miyajima, and Ezekiel. Pet. 4, 72.

1. Overview of Ezekiel

Ezekiel is directed to providing remote access from a host system to an instrument. Ex. 1006, [57]. More specifically, Ezekiel teaches that instrument 20 is in communication with remote application 10, which is a Java applet application that runs within a Web browser application. *Id.* at 2:45–53. Ezekiel teaches that Uniform Resource Locator (URL) 72 links remote application 10 to an instrument, such as one of a signal source, a signal analyzer, a meter, or a sensor. *Id.* at 4:12–26.

2. Discussion of Claims 16 and 31

We begin our analysis with claim 16, which depends directly from claim 1 and further requires "wherein said client apparatus further comprises audio output means connected to said client-side demodulation means, such that the audio output means will audibly output the data on the measurement processing results." Ex. 1001, 8:48–52. Petitioner contends that Sunshine's teaching that the field device can be a Palm or Handspring handheld device renders obvious the further recitations in claim 16. Pet. 62–63 (citing

¹⁰ Although the Petition does not specifically include claim 31 in the list of claims challenged on the basis of the second ground of obviousness over Sunshine, Miyajima, and Ezekiel (Pet. 4, 72), in its contentions for claim 31, Petitioner argues that "Sunshine alone or in combination with Ezekiel render this claim obvious" and references sections VI.A.10 and VI.B.4 (*id.* at 67), which pertains to "**Ground 2**" (*id.* at 72).

Ex. 1004, 4:63–5:13; Ex. 1007 ¶¶ 109–10). Petitioner, additionally, contends "*Ezekiel* discloses the client device receiving output from the instrument via a Web browser and that Web browsers can deliver sound to the user." *Id.* at 74 (citing Ex. 1006, 1:19–24, 2:45–53; Ex. 1007 ¶¶ 109–110). Consistent with Petitioner's contentions (Pet. 62, 63, 74), Sunshine teaches that the field device is a Palm or Handspring handheld device (Ex. 1004, 4:63–5:13) and Ezekiel teaches "[u]se of web browsers over the World Wide Web facilities" to communicate "graphics, *audio* and video data." Ex. 1006, 1:19–24 (emphasis added).

Petitioner contends that Sunshine and Ezekiel are "in the same field of working with measurements in a client/server environment," "discuss the use of the Internet," and "recite performing measurement processing at a server in response to a request from a client." Pet. 73 (citing Ex. 1004, [57], 6:55–65; Ex. 1006, [57], 1:1–2, 2:45–53; Ex. 1007 ¶¶ 50–57, 116–17). Petitioner additionally points to "the ubiquity of interactive Web site applications at the time, including those disclosed of posting the results for retrieval." *Id.* at 76 (citing Ex. 1007 ¶¶ 112–13). At this juncture of the proceeding, having reviewed the Petition and Preliminary Response, and the evidence cited therein, we are persuaded that Petitioner has provided sufficient articulated reasoning for institution.

Claim 31 is similar to claim 16, except it depends from claim 17 and requires only audibly outputting the data on the measurement processing results. Based on the record before us and at this stage in the proceeding, Petitioner has made a sufficient showing with respect to claim 31 similar to its showing with respect to claim 16. *Compare* Pet. 66–67 *with id.* at 62, 63, 74.

At this juncture, Patent Owner does not argue dependent claims 16 and 31 separately. Prelim. Resp. 17, 31. For the reasons given and on the record before us, we determine that Petitioner has shown sufficient basis for instituting trial on the ground that claims 16 and 31 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine and Miyajima alone, or also in combination with and Ezekiel.

3. Discussion of Claims 32, 34, and 35

Independent claim 32 is similar to claim 1, except that it includes the further recitations of "connecting a server computer and a client computer through a Web site on the Internet" and "wherein applications for measurement services are accepted on the Web site." Ex. 1001, 9:55–65.

Based on the record before us and at this juncture, Petitioner has made a sufficient showing with respect to claim 32 similar to its showing with respect to claim 1. Pet. 75. Petitioner also has made a sufficient showing with respect to the further recitations in claim 32. *Id.* at 75–80. For instance, consistent with Petitioner's contentions (*id.* at 75–76), Sunshine teaches "processor 12 can reside on a server 28 hosting a website" (Ex. 1004, 7:5–6). Also consistent with Petitioner's contentions (Pet. 77–79), Ezekiel, for example, teaches "[t]he application class of instrument 20 is linked to web page 70 with an HTTP address." Ex. 1006, 3:64–4:8. Patent Owner does not argue this claim separately.

Claims 34 and 35 depend from independent claim 32 and further require selecting a measurement instrument on the Web site and confirming the operating state of the instrument on the Web site, respectively. Based on the record before us and at this juncture, Petitioner has made a sufficient

showing with respect to claims 34 and 35. *See*, *e.g.*, Pet. 80–81. For instance, consistent with Petitioner's contentions (Pet. 81), Ezekiel teaches a URL linking remote application 10 to instruments and then selecting one of the instruments. Ex. 1006, 3:64–4:51. Patent Owner does not argue these claims separately.

In addition to the reasons to combine Sunshine and Ezekiel discussed *supra* § II.E.2, Petitioner contends that Ezekiel's "advantage of providing flexibility in accessing an instrument from a remote location," would have motivated a person having ordinary skill in the art to combine Ezekiel with Sunshine's system that already uses a Web site for communication. Pet. 80 (citing, *e.g.*, Ex. 1006, 4:44–56). At this juncture of the proceeding, having reviewed the Petition and Preliminary Response, and the evidence cited therein, we are persuaded that Petitioner has provided sufficient articulated reasoning for institution.

Based on the record before us, we determine that Petitioner has shown sufficient basis for instituting trial on the ground that claims 32, 34, and 35 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine, Miyajima, and Ezekiel.

4. Conclusion

Having reviewed the Petition and Preliminary Response, and the evidence cited therein, based on the record before us at this juncture, we determine that Petitioner has demonstrated a reasonable likelihood of showing that (1) claims 16 and 31 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine and Miyajima alone or also in

combination with Ezekiel; and (2) claims 32, 34, and 35 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine, Miyajima, and Ezekiel.

F. Obviousness over Sunshine, Miyajima, and Nathanson

Petitioner contends claims 5, 12, 21, and 27 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine, Miyajima, and Nathanson. Pet. 81–82.

1. Overview of Nathanson

Nathanson is directed to a mobile automotive telemetry system for installation on-board a vehicle. Ex. 1010, at [57]. Nathanson teaches monitoring information on a vehicle, such as exhaust emission, and communicating this information to a server. *Id.* at 4:28–31. The information is sent via wireless data links so that the vehicle can be in any location reachable on the Internet. *Id.* at 4:4–16.

2. *Discussion of Claims 5, 12, 21, and 27*

Claims 5 and 12 depend, directly, from claim 1 and claims 21 and 27 depend, directly, from claim 17. Each of these claims 5 and 21 further requires that the measurement data are indicative of the state of equipment on an automobile. Petitioner contends that the combination of Sunshine, Miyajima, and Nathanson teaches all elements of claims 5, 12, 21, and 27 and provides a rationale for combining the teachings of Sunshine, Miyajima, and Nathanson. Pet. 81–82. Consistent with Petitioner's contentions (*id.*), Nathanson teaches monitoring information on a vehicle, such as exhaust emission (Ex. 1010, 4:28–31) and sending this information wirelessly so that the vehicle can be in any location reachable on the Internet (*id.* at 4:4–16).

Relying on the testimony of Mr. Zatarain, Petitioner also contends that a person of ordinary skill in the art would have been motivated to combine the teachings of Sunshine and Nathanson to apply Sunshine's teachings in the automotive context. Pet. 81–82 (citing Ex. 1007 ¶¶ 50–57). Mr. Zatarain testifies regarding the desirability for data exchange among diverse computers and instruments. Ex. 1007 ¶ 50. At this juncture, having reviewed the Petition and Preliminary Response, and the evidence cited therein, we are persuaded that Petitioner has provided sufficient articulated reasoning for institution. At this stage in the proceeding, Patent Owner does not argue these claims separately.

Based on the record before us at this juncture, we determine that Petitioner has shown sufficient basis for instituting trial on the ground that claims 5, 12, 21, and 27 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine, Miyajima, and Nathanson.

3. Conclusion

Having reviewed the Petition and Preliminary Response, and the evidence cited therein, based on the record before us at this juncture, we determine that Petitioner has demonstrated a reasonable likelihood of showing claims 5, 12, 21, and 27 are unpatentable, under 35 U.S.C. § 103(a), as obvious over Sunshine, Miyajima, and Nathanson.

III. CONCLUSION

For the foregoing reasons, we determine that the information presented establishes a reasonable likelihood that Petitioner would prevail in showing that all challenged claims of the '940 patent are unpatentable. At this preliminary stage, we have not made a final determination with respect

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to the patentability of the challenged claims or any underlying factual and legal issues.

IV. ORDER

Accordingly, it is:

ORDERED that pursuant to 35 U.S.C. § 314(a), an *inter partes* review is hereby instituted as to claims 1, 2, 5, 7–13, 15–18, 21, 23–28, 30–32, 34, 35, and 38–41 of the '940 patent on the following grounds of unpatentability:

References	Challenged Claims
Sunshine and Miyajima	1, 2, 7–11, 13, 15–18, 23–26, 28, 30, 31, and 38–41
Sunshine, Miyajima, Ezekiel	16, 31, 32, 34, and 35
Sunshine, Miyajima, Nathanson	5, 12, 21, and 27

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, which commences on the entry date of this decision; and

FURTHER ORDERED that the trial is limited to the grounds identified immediately above, and no other ground is authorized.

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