

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

CALLMINER, INC.,
Petitioner,

v.

MATTERSIGHT CORPORATION,
Patent Owner.

IPR2020-00272
Patent 8,023,639 B2

Before KEVIN F. TURNER, JUSTIN T. ARBES, and
SHEILA F. McSHANE, *Administrative Patent Judges*.

McSHANE, *Administrative Patent Judge*.

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

I. INTRODUCTION

A. *Background and Summary*

CallMiner, Inc. (“CallMiner” or “Petitioner”) filed a Petition requesting *inter partes* review of claims 1–3, 5–9, and 11–15 of U.S. Patent No. 8,023,639 B2 (Ex. 1001, “the ’639 patent”) pursuant to 35 U.S.C. §§ 311–319, along with the supporting Declaration of Benedict Occhiogrosso. Paper 2 (“Pet.”); Ex. 1007. Mattersight Corporation (“Mattersight” or “Patent Owner”) filed a Preliminary Response to the Petition. Paper 7 (“Prelim. Resp.”).

We have authority under 35 U.S.C. § 314(a), which provides that 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.”

For the reasons that follow, we determine that Petitioner has not demonstrated that there is a reasonable likelihood that it would prevail in showing the unpatentability of at least one of the challenged claims. For the reasons set forth below, and pursuant to 35 U.S.C. § 314, we do not institute *inter partes* review of claims 1–3, 5–9, and 11–15 of the ’639 patent.

B. *Related Matters*

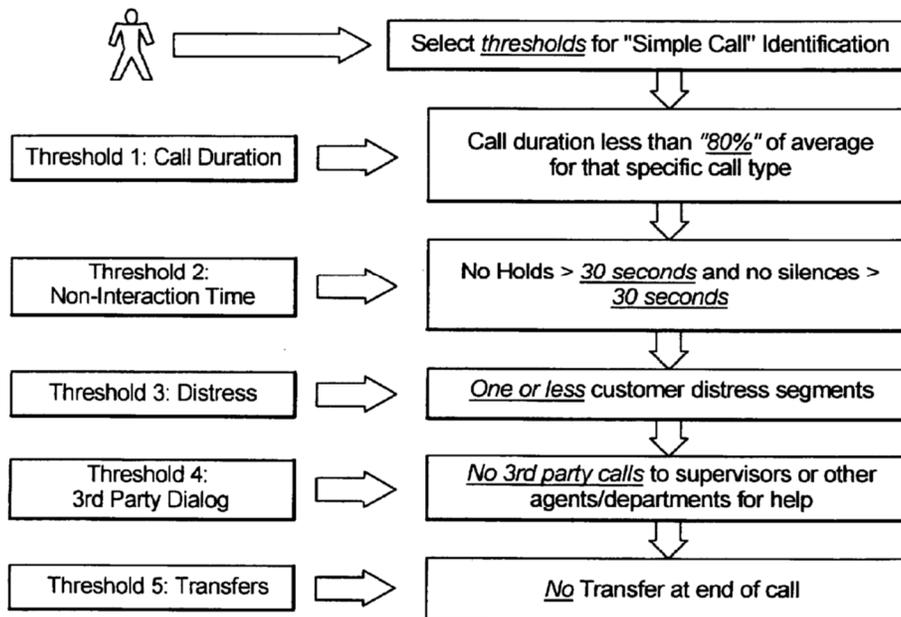
The parties identify *NICE Ltd., NICE Systems Inc., and Mattersight Corporation v. CallMiner, Inc.*, Civil Action No. 1:18-cv-02024-RGA-SRF (D. Del.), filed on December 19, 2018, as a related matter. Pet. 4; Paper 4, 1.

C. The '639 Patent

The '639 patent is titled "Method and System Determining the Complexity of a Telephonic Communication Received By a Contact Center" and issued on September 20, 2011, from an application filed on March 28, 2008. Ex. 1001, codes (22), (45), (54). The '639 patent also claims priority to U.S. Provisional Application No. 60/921,060. *Id.*, code (60).

The '639 patent is directed to a method and system for determining the complexity of telephonic communications received by a call center. Ex. 1001, 2:7–9. The patent discloses that this is done by establishing a call rule based on the following thresholds: a call duration threshold, a non-interaction threshold, a distress event threshold, a third party dialog threshold, and a call transfer threshold. *Id.* at 2:25–19, 4:35–37. Figure 2, reproduced below, presents a block diagram of a call rule configuration. *Id.* at 3:51–52.

FIG. 2



As shown in Figure 2, above, call rules are established based on desired thresholds. Ex. 1001, 4:26–28.

The '639 patent discloses that telephonic communications are received by the system and the call attributes of the communications are determined. Ex. 1001, 4:31–35. Call rules are established by configuring phone event data thresholds. *Id.* at 7:28–36. The established call rules are then compared to the call attributes of the telephonic communications. *Id.* at 4:37–39. Data indicative of the complexity of the calls are generated by comparisons. *Id.* at 4:39–41.

The '639 patent discloses that output data indicative of the complexity of the call type are transmitted and the “data indicates whether at least one of the call sets is self-service eligible.” Ex. 1001, 15:12–15. It further explains that “if the call attributes meet (either by exceeding or falling below, depending on the nature of the configuration) the corresponding thresholds of the call rule,” the output indicates whether “future telephonic communications of a particular call type or call types may be better suited for routing through a self-service system such as, for example, an IVR [interactive voice response] or Internet web portal.” *Id.* at 15:16–22.

Challenged claims 1, 7, and 12 are independent. Claim 1 of the '639 patent is reproduced below.

1. A non-transitory computer program for determining the complexity of a telephonic communication received by a contact center, the computer program being embodied on a computer readable storage medium adapted to control a computer and comprising:
 - a code segment for receiving an input transmission of a predetermined call rule;
 - a code segment for receiving a telephonic communication;

a code segment for determining call attributes associated with the telephonic communication;

a code segment for comparing the call rule to the call attributes of the telephonic communication; and

a code segment indicative of the complexity of the telephonic communication and, a code segment for generating a graphical user interface for viewing the telephonic communication on display, the graphical user interface being configured to display a time-based being representation of the telephonic communication, the time-based representation including graphical representation of the call attributes associated with the telephonic communication; wherein the time-based representation of the telephonic communication includes a graphical representation of the progress of the audio file being played.

Ex. 1001, 16:42–65.

D. Asserted Grounds of Unpatentability

Petitioner challenges the patentability of claims of the '639 patent on the following grounds:

Claim(s) Challenged	35 U.S.C. §	References
1–3, 5, 6, 12	103	Eilbacher ¹ , Peterson ²
7–9, 11, 13–15	103	Eilbacher, Peterson, Konig ³
8, 13	103	Eilbacher, Peterson, Konig, Blanchard ⁴
6	103	Eilbacher, Peterson, Blair ⁵

¹ U.S. Patent No. 6,724,887 B1, filed on January 24, 2000, issued on April 20, 2004. Ex. 1002.

² U.S. Patent No. 8,102,973 B2, filed on February 22, 2005, issued on January 24, 2012. Ex. 1003.

³ U.S. Patent No. 7,487,094 B1, filed on June 18, 2004, issued on February 3, 2009. Ex. 1004.

⁴ U.S. Patent No. 8,204,205 B1, filed on February 8, 2007, issued on June 19, 2012. Ex. 1005.

⁵ U.S. Patent No. 6,404,857 B1, filed on February 10, 2000, issued on June 11, 2002. Ex. 1006.

Claim(s) Challenged	35 U.S.C. §	References
11	103	Eilbacher, Peterson, Konig, Blair

Pet. 6–7. Petitioner asserts that the last two grounds are alternatives based on means-plus-function claim interpretations. *See id.* at 6–7, 55–56, 80–81.

II. ANALYSIS

For petitions filed after November 13, 2018, the Board applies the same claim construction standard as that applied in federal courts. *See* 37 C.F.R. § 42.100(b) (2019). Under the principles set forth by our reviewing court, the “words of a claim ‘are generally given their ordinary and customary meaning,’” as would be understood by a person of ordinary skill in the art in question at the time of the invention. *Phillips v. AWH Corp.*, 415 F.3d 1303, 1312 (Fed. Cir. 2005) (en banc) (quoting *Vitronics Corp. v. Conceptronic, Inc.*, 90 F.3d 1576, 1582 (Fed. Cir. 1996)).

Petitioner asserts that several means-plus-function limitations may be recited in the challenged claims, specifically those reciting “code segments,” which is a term in all challenged independent claims.⁶ *See* Pet. 23–29. For example, claim 1 recites “a code segment for receiving an input transmission of a predetermined call rule.” Petitioner discusses legal standards for assessing whether a limitation is a means-plus-function limitation, but does not present its position on whether the “code segment” claim elements are means-plus-function elements. *Id.* at 16–20, 23; Ex. 1007 ¶¶ 61–66. Instead, Petitioner states that it presents its arguments for unpatentability under both a plain and ordinary meaning of the term, as well as a means-

⁶ Independent claims 1 and 7 recite “code segment” in each of their limitations, respectfully. *See* Ex. 1001, 16:42–65, 17:17–18:4. Claim 12 includes “code segment” in only one of its limitations. *See id.* at 18:18–42.

plus-function interpretation. *See* Pet. 23; Ex. 1007 ¶ 67. Petitioner presents a table alleged to identify the proposed function and structure of these limitations, “[t]o the extent the Patent Owner argues, or the Board determines” that the “code segment” limitations are mean-plus-function types. *Id.* at 23–29.

Patent Owner does not present its proposed construction of the individual “code segment” claim terms. *See generally* Prelim. Resp. However, as we discuss in more detail below, Patent Owner asserts that Petitioner does not identify specific structures for the means-plus-function terms. *Id.* at 30–31.

The use of the word “means” in a claim element creates a rebuttable presumption that 35 U.S.C. § 112 ¶ 6⁷ applies. *See Williamson v. Citrix Online, LLC*, 792 F.3d 1339, 1348 (Fed. Cir. 2015) (en banc in relevant part). Conversely, “the failure to use the word ‘means’ also creates a rebuttable presumption [that § 112 ¶ 6] does not apply.” *Id.* The presumption may be overcome if the term “fails to ‘recite[] sufficiently definite structure’ or else recites ‘function without reciting sufficient structure for performing that function.’” *Id.* *Williamson* held that “[g]eneric terms such as ‘mechanism,’ ‘element,’ ‘device,’ and other nonce words that reflect nothing more than verbal constructs may be used in a claim in a manner that is tantamount to using the word ‘means’ because they ‘typically do not connote sufficiently definite structure’ and therefore may invoke

⁷ Section 4(c) of the Leahy-Smith America Invents Act (“AIA”), Pub. L. No. 112-29, 125 Stat. 284, 296 (2011) redesignated 35 U.S.C. § 112, sixth paragraph as 35 U.S.C. § 112(f). Because the application from which the ’639 patent issued was filed before September 16, 2012, the effective date of the relevant amendment, we refer to the pre-AIA version of § 112.

§ 112, para. 6.” *Id.* at 1350 (quoting *Mass. Inst. of Tech. & Elecs. for Imaging, Inc. v. Abacus Software*, 462 F.3d 1344, 1354 (Fed. Cir. 2006)). *Williamson* informs that “[t]he standard is whether the words of the claim are understood by persons of ordinary skill in the art to have a sufficiently definite meaning as the name for structure.” *Id.* at 1349 (citing *Greenberg v. Ethicon Endo–Surgery, Inc.*, 91 F.3d 1580, 1583 (Fed. Cir. 1996)).

Petitioner fails to provide arguments on whether the “code segment” terms are means-plus-function terms or to present expert testimony on whether the limitations sufficiently recite definite structure for performing the recited functions to one of ordinary skill in the art. *See* Pet. 16–20, 23; Ex. 1007 ¶¶ 61–66. On the record presented, our view is that the term “code segment,” as used in the claim limitations at issue, is properly construed as a mean-plus-function element under § 112 ¶ 6. Similar to the use of the phrase “module for” in *Williamson*, the phrase “code segment for” replaces the phrase “means for” as a generic description for software code that performs functions. *See Williamson*, 792 F.3d at 1350. The “code segment” term is used in the respective limitations to describe functionality without identifying any structure. For instance, in claim 1 the code segments are recited to perform the functions of: “receiving an input transmission of a predetermined call rule,” “receiving a telephonic communication,” “determining call attributes,” “comparing the call rule to the call attributes,” “generating output data,” and “generating a graphical user interface.”

Cases like *Zeroclick, LLC v. Apple Inc.*, which found that the term “user interface code” was not a means-plus-function term, are distinguishable. 891 F.3d 1003, 1008 (Fed. Cir. 2018). In *Zeroclick*, the Federal Circuit considered the term in context with the surrounding claim

language, which contained details of configuration and what the code did, such that it could be determined that the terms “are used not as generic terms or black box recitations of structure or abstractions, but rather as specific references to conventional graphical user interface programs or code, existing in prior art at the time of the inventions.” *Id.*; *see also id.* at 1006. Here, the independent claim limitations using the term “code segment” do not provide similar specific references, nor does Petitioner direct us to any such references, nor does Petitioner provide expert testimony on the nature of the claims or on the conventionality of the code. *See* Pet. 23–27; Ex. 1007 ¶¶ 61–67. Accordingly, on the present record, the “code segment” limitations, as used in the independent claims at issue, are properly construed as mean-plus-function elements under § 112 ¶ 6.

By rule, Petitioner is required to identify in its Petition the corresponding structure in the specification for means-plus-function terms. *See* 37 C.F.R. § 42.104(b)(3) (“Where the claim to be construed contains a means-plus-function . . . limitation . . . the construction of the claim *must* identify the specific portions of the specification that describe the structure, material, or acts corresponding to each claimed function.”) (emphasis added). Construing a means-plus-function limitation under 35 U.S.C. § 112 ¶ 6 involves two steps: (1) identifying the claimed function and (2) identifying in the specification the corresponding structure that performs the claimed function. *Medical Instrumentation & Diagnostics Corp. v. Elekta AB*, 344 F.3d 1205, 1210 (Fed. Cir. 2003); *Cardiac Pacemakers, Inc. v. St. Jude Med., Inc.*, 296 F.3d 1106, 1119 (Fed. Cir. 2002).

“In cases involving a computer-implemented invention in which the inventor has invoked means-plus-function claiming, [the Federal Circuit] has

consistently required that the structure disclosed in the specification be more than simply a general purpose computer or microprocessor.” *Aristocrat Techs. Australia Pty Ltd. v. Int’l Game Tech.*, 521 F.3d 1328, 1333 (Fed. Cir. 2008). “A computer-implemented means-plus-function term is limited to the corresponding structure disclosed in the specification and equivalents thereof, and the corresponding structure is the algorithm.” *Harris Corp. v. Ericsson Inc.*, 417 F.3d 1241, 1253 (Fed. Cir. 2005) (quoted with approval in *Aristocrat*). “The algorithm may be expressed as a mathematical formula, in prose, or as a flow chart, or in any other manner that provides sufficient structure.” *Williamson*, 792 F.3d at 1352 (citing *Noah Sys., Inc. v. Intuit Inc.*, 675 F.3d 1302, 1312 (Fed. Cir. 2012)).

Petitioner refers to a table for the means-plus-function terms, stating that the table “identifies the claimed function[s] in bold italics.” Pet. 23. Petitioner further contends that “[t]o the extent that corresponding structure is disclosed in the specification, it can only be at one or more of the citations in the table.” *Id.* Reproduced below are portions of the table that Petitioner provides. *Id.* at 24.

	Claim Term ³	“Structure” in ‘639 Patent Specification (EX1001)
1.	a code segment for <i>receiving an input transmission of a predetermined call rule</i> (claims 1, 7)	3:2-6; 5:14-26; 6:12-44; 7:28-8:22
2.	a code segment for <i>receiving a telephonic communication</i> (claim 1)	4:20-25; 8:36-51; 9:32-50; FIGs. 4, 5 & 6
3.	a code segment for <i>determining call attributes associated with the telephonic communication</i> (claim 1)	14:32-15:7; 2:31-41; 3:7-23; 3:32-39; FIG. 1
4.	a code segment for <i>comparing the call rule to the call attributes of the telephonic communication</i> (claim 1)	FIGs. 2, 9 & 10; 2:18-21; 2:36-41; 3:17-19; 4:35-41; 15:8-21; 15:45-53; 15:61-65

³ The italicized bolded portions of each claim term identifies the corresponding recited function.

5.	a code segment for <i>generating output data indicative of the complexity of the telephonic communication</i> (claim 1)	FIG 1 (item 60); 2:58-62; 3:19-23; 15:11-35; 15:63-65
6.	a code segment for <i>generating a graphical user interface for viewing the telephonic communication on display, the graphical user interface being configured to display a time-based [being] representation of the telephonic communication, the time-based representation including graphical representation of the call attributes associated with the telephonic communication; wherein the time-based representation of the telephonic communication includes a graphical representation of the progress of the audio file being played</i> (claims 1, 12)	3:27-38; 15:66-16:35
7.	a code segment for <i>generating an audio file of the telephonic communication</i> (claim 6)	3:27-38; 11:51-14:7; FIGs. 4, 5, 7 & 8

Pet. 24–25. As shown in portions of the table above, and elsewhere in the remainder of the table, Petitioner identifies the alleged function of each

means-plus-function terms in the bolded italicized portion of the claim limitation, and lists portions of the '639 patent only to identify the alleged structure. Pet. 23–27.

Although Petitioner lists portions of the '639 patent for the alleged structure of the means-plus-function terms—that is, “to the extent that corresponding structure is disclosed in the specification”—Petitioner fails to explain or identify what the structure is. *See* Pet. 23–27; Ex. 1007 ¶¶ 61–67. We note that some of the portions of the specification cited as allegedly disclosing structure are extensive, they include multiple figures, absent identification of specific items in the figures, and some specification citations cover multiple columns.

Patent Owner argues that what Petitioner has done in the Petition for the means-plus-function claim terms is contrary to Board rules. Prelim. Resp. 30–31. Patent Owner asserts that Petitioner never specifies what it believes the structure is for the means-plus-function elements. *Id.* at 30. Patent Owner contends that Petitioner refers to unexplained string citations to voluminous portions of the specification such as relying on multiple columns of material and multiple figures, without identifying what portions of the citations contain the alleged structure. *Id.* (citing Pet. 24–25). Patent Owner further asserts that Petitioner leaves its analysis “entirely open-ended, expecting the Board (and Patent Owner) to figure it out.” *Id.* As such, Patent Owner argues that this practice is not envisioned under 37 C.F.R. § 42.104(b)(3) or Board decisions. *Id.* at 30–31 (citing *Apple Inc. v. ContentGuard Holdings*, IPR2015-00456, Paper 9 at 6 (PTAB June 15, 2015)). Patent Owner asserts that by Petitioner’s failure to identify structures for elements invoking § 112 ¶ 6, Petitioner could argue the

meaning of its Petition “in myriad ways” if a trial were instituted. *Id.* at 31. Patent Owner further argues that the Petition fails to identify any algorithms supplying structure for the limitations. *Id.* at 32–34. Patent Owner refers to Petitioner’s assertions that the prior art references disclose algorithms that meet claim limitations without specifying what the algorithms are. *Id.* at 33 (citing Pet. 40).

We agree with Patent Owner. Petitioner’s string citations to broad portions of the specification and multiple figures, absent any explanation or identification of structure, do not fulfill Petitioner’s obligation to identify corresponding structure under 37 C.F.R. § 42.104(b)(3). Further, there has been no attempt by Petitioner to address any algorithms corresponding to the “code segment[s]” in its unpatentability contentions. Although Petitioner attempts to map portions of the prior art to some means-plus-function terms with alleged “algorithms” of the claim elements, Petitioner fails to identify any algorithms or other structures in the first place. *See, e.g.*, Pet. 40–41, 43, 45.

Additionally, the position Petitioner takes in the Petition with respect to the means-plus-function limitations is improper in that Petitioner contends that “[t]o the extent that corresponding structure is disclosed in the specification, it can only be at one or more of the citations in the table.” *See* Pet. 23. Effectively, Petitioner is extending an offer to the Board to review portions of the ’639 patent specification to determine if there is sufficient support. This, in effect, seeks an advisory opinion from the Board as to whether the challenged claims are indefinite under 35 U.S.C. § 112 ¶ 2.

Absent any explanation or sufficient identification from Petitioner of the structure of the means-plus-function terms, we decline to review the

large portions of the specification to try to determine the corresponding structure of these terms. Additionally, we also decline to take a position on whether the challenged claims are indefinite. The purpose of a decision on institution is to make a threshold determination whether Petitioner has shown a reasonable likelihood of success on the statutory grounds set forth in § 311(a) (based on obviousness under § 103), not to issue advisory opinions on issues for which we have no statutory authority. 35 U.S.C. § 314(a).

III. CONCLUSION

Petitioner does not set forth sufficient claim construction for the means-plus-function limitations of the challenged claims. By failing to set forth such a claim construction, the Petition does not show how the challenged claims are to be construed in accordance with 37 C.F.R. § 42.104(b)(3), and also does not show how, as so construed, they are unpatentable under the statutory grounds identified in the Petition. *See* 37 C.F.R. § 42.104(b)(4).

Accordingly, Petitioner has not established a reasonable likelihood that it would prevail in showing the unpatentability of claims 1–3, 5–9, and 11–15 of the '639 patent.

IV. ORDER

Accordingly, it is:

ORDERED that the Petition is *denied* as to the challenged claims 1–3, 5–9, and 11–15 of the '639 patent; and

FURTHER ORDERED that no *inter partes* review is instituted.

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