

IN THE UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF DELAWARE

PI-NET INTERNATIONAL INC.,)	
)	
Plaintiff,)	
)	
v.)	Civ. No. 12-282-SLR
)	
JPMORGAN CHASE & CO.,)	
)	
Defendant.)	

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MEMORANDUM OPINION

Dated: May 14, 2014
Wilmington, Delaware


ROBINSON, District Judge

I. INTRODUCTION

Plaintiff Pi-Net International, Inc. (“plaintiff”) filed a complaint alleging patent infringement against JPMorgan Chase & Co. (“defendant”) on March 1, 2012 alleging infringement of three patents: U.S. Patent Nos. 5,987,500 (“the ‘500 patent”), 8,037,158 (“the ‘158 patent”), and 8,108,492 (“the ‘492 patent”) (collectively, the “patents-in-suit”). (D.I. 1) Defendant answered the complaint, asserting affirmative defenses of invalidity and non-infringement, on May 23, 2012. (D.I. 11)

Presently before the court are several motions for summary judgment: defendant’s motion for summary judgment of non-infringement (D.I. 113) and for invalidity of the patents-in-suit (D.I. 121), as well as defendant’s motion for partial summary judgment of laches for the ‘500 patent (D.I. 111). Plaintiff moved to strike defendant’s opening brief in support of its partial summary judgment of laches for the ‘500 patent. (D.I. 132) The parties also filed motions to exclude testimony: defendant’s motion to exclude certain testimony of Stevan Porter (D.I. 109) and plaintiff’s motions to exclude the expert testimony of Susan Spielman (D.I. 115), certain testimony by Michael Siegel (D.I. 117), and certain testimony by Dawn Hall (D.I. 119). The court has jurisdiction over this matter pursuant to 28 U.S.C. §§ 1331 and 1338(a).

II. BACKGROUND

A. The Parties

Plaintiff is a California corporation with a principal place of business in Menlo Park, California. (D.I. 1 at ¶ 1) Plaintiff provides innovative software products, services

and solutions that enable distributed transaction processing and control over public and private networks, including (without limitation) the Internet and the World-Wide Web. Plaintiff owns the patents-in-suit. (*Id.*) Defendant is a Delaware corporation with a registered agent in Wilmington, Delaware and an office in New York, New York. (D.I. 11 at ¶ 3) Defendant is a global financial services firm that operates in various locations, including the United States of America, conducting business in the fields of investment banking, financial services for consumers and small businesses, commercial banking, financial transaction processing, asset management, and private equity. (*Id.*)

B. Technology Overview

The patents-in-suit generally claim a system and method for online transactions, wherein a user takes an action at the “front-end” that causes data to be routed through a system and used as a basis to execute a transaction at the “back-end,” thereby completing a non-deferred (or “real time”) transaction. Plaintiff accuses six online banking instrumentalities of infringing the ‘500 patent and the ‘492 patent: Account Transfers; Payments; Customer Center; Account Activity (Business Card); Wire Transfers; and Chase Mobile Application, QuickPay (“Mobile QuickPay”). Only the Account Transfers instrumentality is accused of infringing the ‘158 patent. With the exception of Mobile QuickPay, all of the accused instrumentalities are accessible to defendant’s customers through its website. (D.I. 114 at 4-5)

III. STANDARDS OF REVIEW

A. Summary Judgment

“The court shall grant summary judgment if the movant shows that there is no genuine dispute as to any material fact and the movant is entitled to judgment as a matter of law.” Fed. R. Civ. P. 56(a). The moving party bears the burden of demonstrating the absence of a genuine issue of material fact. *Matsushita Elec. Indus. Co. v. Zenith Radio Corp.*, 415 U.S. 574, 586 n.10 (1986). A party asserting that a fact cannot be—or, alternatively, is—genuinely disputed must support the assertion either by citing to “particular parts of materials in the record, including depositions, documents, electronically stored information, affidavits or declarations, stipulations (including those made for the purposes of the motions only), admissions, interrogatory answers, or other materials,” or by “showing that the materials cited do not establish the absence or presence of a genuine dispute, or that an adverse party cannot produce admissible evidence to support the fact.” Fed. R. Civ. P. 56(c)(1)(A) & (B). If the moving party has carried its burden, the nonmovant must then “come forward with specific facts showing that there is a genuine issue for trial.” *Matsushita*, 415 U.S. at 587 (internal quotation marks omitted). The court will “draw all reasonable inferences in favor of the nonmoving party, and it may not make credibility determinations or weigh the evidence.” *Reeves v. Sanderson Plumbing Prods., Inc.*, 530 U.S. 133, 150 (2000).

To defeat a motion for summary judgment, the non-moving party must “do more than simply show that there is some metaphysical doubt as to the material facts.” *Matsushita*, 415 U.S. at 586-87; *see also Podohnik v. U.S. Postal Service*, 409 F.3d 584, 594 (3d Cir. 2005) (stating party opposing summary judgment “must present more than just bare assertions, conclusory allegations or suspicions to show the existence of a genuine issue”) (internal quotation marks omitted). Although the “mere existence of

some alleged factual dispute between the parties will not defeat an otherwise properly supported motion for summary judgment,” a factual dispute is genuine where “the evidence is such that a reasonable jury could return a verdict for the nonmoving party.” *Anderson v. Liberty Lobby, Inc.*, 411 U.S. 242, 247-48 (1986). “If the evidence is merely colorable, or is not significantly probative, summary judgment may be granted.” *Id.* at 249-50 (internal citations omitted); *see also Celotex Corp. v. Catrett*, 411 U.S. 317, 322 (1986) (stating entry of summary judgment is mandated “against a party who fails to make a showing sufficient to establish the existence of an element essential to that party’s case, and on which that party will bear the burden of proof at trial”).

B. Infringement

A patent is infringed when a person “without authority makes, uses or sells any patented invention, within the United States . . . during the term of the patent.” 35 U.S.C. § 271(a). A two-step analysis is employed in making an infringement determination. *See Markman v. Westview Instruments, Inc.*, 52 F.3d 967, 976 (Fed. Cir. 1995). First, the court must construe the asserted claims to ascertain their meaning and scope. *See id.* Construction of the claims is a question of law subject to de novo review. *See Cybor Corp. v. FAS Techs.*, 138 F.3d 1448, 1454 (Fed. Cir. 1998). The trier of fact must then compare the properly construed claims with the accused infringing product. *See Markman*, 52 F.3d at 976. This second step is a question of fact. *See Bai v. L & L Wings, Inc.*, 160 F.3d 1350, 1353 (Fed. Cir. 1998).

“Direct infringement requires a party to perform each and every step or element of a claimed method or product.” *BMC Res., Inc. v. Paymentech, L.P.*, 498 F.3d 1373,

1378 (Fed. Cir. 2007), *overruled on other grounds by* 692 F.3d 1301 (Fed. Cir. 2012). “If any claim limitation is absent from the accused device, there is no literal infringement as a matter of law.” *Bayer AG v. Elan Pharm. Research Corp.*, 212 F.3d 1241, 1247 (Fed. Cir. 2000). If an accused product does not infringe an independent claim, it also does not infringe any claim depending thereon. *See Wahpeton Canvas Co. v. Frontier, Inc.*, 870 F.2d 1546, 1553 (Fed. Cir. 1989). However, “[o]ne may infringe an independent claim and not infringe a claim dependent on that claim.” *Monsanto Co. v. Syngenta Seeds, Inc.*, 503 F.3d 1352, 1359 (Fed. Cir. 2007) (quoting *Wahpeton Canvas*, 870 F.2d at 1552) (internal quotations omitted). A product that does not literally infringe a patent claim may still infringe under the doctrine of equivalents if the differences between an individual limitation of the claimed invention and an element of the accused product are insubstantial. *See Warner-Jenkinson Co. v. Hilton Davis Chem. Co.*, 520 U.S. 17, 24 (1997). The patent owner has the burden of proving infringement and must meet its burden by a preponderance of the evidence. *See SmithKline Diagnostics, Inc. v. Helena Lab. Corp.*, 859 F.2d 878, 889 (Fed. Cir. 1988) (citations omitted).

When an accused infringer moves for summary judgment of non-infringement, such relief may be granted only if one or more limitations of the claim in question does not read on an element of the accused product, either literally or under the doctrine of equivalents. *See Chimie v. PPG Indus., Inc.*, 402 F.3d 1371, 1376 (Fed. Cir. 2005); *see also TechSearch, L.L.C. v. Intel Corp.*, 286 F.3d 1360, 1369 (Fed. Cir. 2002) (“Summary judgment of noninfringement is ... appropriate where the patent owner’s

proof is deficient in meeting an essential part of the legal standard for infringement, because such failure will render all other facts immaterial.”). Thus, summary judgment of non-infringement can only be granted if, after viewing the facts in the light most favorable to the non-movant, there is no genuine issue as to whether the accused product is covered by the claims (as construed by the court). See *Pitney Bowes, Inc. v. Hewlett-Packard Co.*, 182 F.3d 1298, 1304 (Fed. Cir. 1999).

C. Invalidity

1. Indefiniteness

The definiteness requirement is rooted in § 112, ¶ 2, which provides that “the specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.” “A determination of claim indefiniteness is a legal conclusion that is drawn from the court’s performance of its duty as the construer of patent claims.” *Personalized Media Comm., LLC v. Int’l Trade Com’n*, 161 F.3d 696, 705 (Fed. Cir. 1998).

Determining whether a claim is definite requires an analysis of whether one skilled in the art would understand the bounds of the claim when read in light of the specification If the claims read in light of the specification reasonably apprise those skilled in the art of the scope of the invention, § 112 demands no more.

Id. (citing *Miles Lab., Inc. v. Shandon, Inc.*, 997 F.2d 870, 875 (Fed. Cir. 1993)).

Under 35 U.S.C. § 112 ¶ 6, “[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 ... in support thereof, and such claim shall be construed to cover the corresponding structure ... described in the specification and equivalents thereof.” This

allows “the use of means expressions in patent claims without requiring the patentee to recite in the claims all possible structures that could be used as means in the claimed apparatus.” *Medical Instrumentation and Diagnostics Corp. v. Elekta AB*, 344 F.3d 1205, 1211 (Fed. Cir. 2003) (citing *O.I. Corp. v. Tekmar Co.*, 115 F.3d 1576, 1583 (Fed. Cir. 1997)). The quid pro quo is the “duty [of the patentee] to clearly link or associate structure to the claimed function.” *Budde v. Harley-Davidson, Inc.*, 250 F.3d 1369, 1377 (Fed. Cir. 2001) (citations omitted). “The price that must be paid for use of that convenience is limitation of the claim to the means specified in the written description and equivalents thereof.” *O.I. Corp.*, 115 F.3d at 1583.

Whether the written description adequately sets forth the structure corresponding to the claimed function must be considered from the perspective of a person skilled in the art. *Telcordia Techs., Inc. v. Cisco Sys.*, 612 F.3d 1365, 1376 (Fed. Cir. 2010) (citing *Intel Corp. v. VIA Techs., Inc.*, 319 F.3d 1357, 1365–66 (Fed. Cir. 2003)). “The question is not whether one of skill in the art would be capable of implementing a structure to perform the function, but whether that person would understand the written description itself to disclose such a structure.” *Id.* (citing *Tech. Licensing Corp. v. Videotek, Inc.*, 545 F.3d 1316, 1338 (Fed. Cir. 2008). Ultimately, if no corresponding structure is disclosed in the specification, the claim term must be construed as indefinite. See *Biomedino, LLC v. Waters Techs. Corp.*, 490 F.3d 946, 950 (Fed. Cir. 2007) (“If there is no structure in the specification corresponding to the means-plus-function limitation in the claims, the claim will be found invalid as indefinite.”).

2. Enablement and written description

The statutory basis for the enablement and written description requirements, 35

U.S.C. § 112 ¶1, provides in relevant part:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same

“The enablement requirement is met where one skilled in the art, having read the specification, could practice the invention without ‘undue experimentation.’” *Streck, Inc. v. Research & Diagnostic Systems, Inc.*, 665 F.3d 1269, 1288 (Fed. Cir. 2012) (citation omitted). “While every aspect of a generic claim certainly need not have been carried out by the inventor, or exemplified in the specification, reasonable detail must be provided in order to enable members of the public to understand and carry out the invention.” *Genentech, Inc. v. Novo Nordisk A/S*, 108 F.3d 1361, 1366 (Fed. Cir. 1997). The specification need not teach what is well known in the art. *Id.* (citing *Hybritech v. Monoclonal Antibodies, Inc.*, 802 F.2d 1367, 1384 (Fed. Cir. 1986)). A reasonable amount of experimentation may be required, so long as such experimentation is not “undue.” *ALZA Corp. v. Andrx Pharms., Inc.*, 603 F.3d 935, 940 (Fed. Cir. 2010).

“Whether undue experimentation is needed is not a single, simple factual determination, but rather is a conclusion reached by weighing many factual considerations.” *Martek Biosciences Corp. v. Nutrinova, Inc.*, 579 F.3d 1363, 1378 (Fed. Cir. 2009) (citing *In re Wands*, 858 F.2d 731, 737 (Fed. Cir. 1988)). The Federal Circuit has provided several factors that may be utilized in determining whether a

disclosure would require undue experimentation: (1) the quantity of experimentation necessary; (2) the amount of direction or guidance disclosed in the patent; (3) the presence or absence of working examples in the patent; (4) the nature of the invention; (5) the state of the prior art; (6) the relative skill of those in the art; (7) the predictability of the art; and (8) the breadth of the claims. *In re Wands*, 858 F.2d at 737. These factors are sometimes referred to as the “*Wands* factors.” A court need not consider every one of the *Wands* factors in its analysis, rather, a court is only required to consider those factors relevant to the facts of the case. See *Streck, Inc.*, 655 F.3d at 1288 (citing *Amgen, Inc. v. Chugai Pharm. Co., Ltd.*, 927 F.2d 1200, 1213 (Fed. Cir. 1991)).

The enablement requirement is a question of law based on underlying factual inquiries. See *Green Edge Enters., LLC v. Rubber Mulch Etc., LLC*, 620 F.3d 1287, 1298-99 (Fed. Cir. 2010) (citation omitted); *Wands*, 858 F.2d at 737. Enablement is determined as of the filing date of the patent application. *In re ‘318 Patent Infringement Litigation*, 583 F.3d 1317, 1323 (Fed. Cir. 2009) (citation omitted). The burden is on one challenging validity to show, by clear and convincing evidence, that the specification is not enabling. See *Streck, Inc.*, 665 F.3d at 1288 (citation omitted).

A patent must also contain a written description of the invention. 35 U.S.C. § 112, ¶ 1. The written description requirement is separate and distinct from the enablement requirement. See *Ariad Pharms., Inc. v. Eli Lilly and Co.*, 598 F.3d 1336, 1351 (Fed. Cir. 2011). It ensures that “the patentee had possession of the claimed invention at the time of the application, i.e., that the patentee invented what is claimed.”

LizardTech, Inc. v. Earth Resource Mapping, Inc., 424 F.3d 1336, 1344-45 (Fed. Cir. 2005). The Federal Circuit has stated that the relevant inquiry – “possession as shown in the disclosure” – is an “objective inquiry into the four corners of the specification from the perspective of a person of ordinary skill in the art. Based on that inquiry, the specification must describe an invention understandable to that skilled artisan and show that the inventor actually invented the invention claimed.” *Ariad*, 598 F.3d at 1351.

This inquiry is a question of fact: “the level of detail required to satisfy the written description requirement varies depending on the nature and scope of the claims and on the complexity and predictability of the relevant technology.” *Id.* (citation omitted). While compliance with the written description requirement is a question of fact, the issue is “amenable to summary judgment in cases where no reasonable fact finder could return a verdict for the non-moving party.” *Id.* at 1307 (citing *Invitrogen Corp. v. Clontech Labs., Inc.*, 429 F.3d 1052, 1072-73 (Fed. Cir. 2005)).

IV. DISCUSSION

A. Indefiniteness

1. The ‘492 patent

The claims and specification of a patent serve an important public notice function, apprising others of what is available to them. *See, e.g., Johnson & Johnston Associates Inc. v. R.E. Service Co., Inc.*, 285 F.3d 1046, 1052 (Fed. Cir. 2002) (citing *Mahn v. Harwood*, 112 U.S. 354, 361 (1884)) (claims give notice to the public of the scope of the patent); *Superior Fireplace Co. v. Majestic Prods. Co.*, 270 F.3d 1358, 1371 (Fed. Cir. 2001). “Because claims delineate the patentee’s right to exclude, the

patent statute requires that the scope of the claims be sufficiently definite to inform the public of the bounds of the protected invention, i.e., what subject matter is covered by the exclusive rights of the patent. Otherwise, competitors cannot avoid infringement, defeating the public notice function of patent claims.” *Halliburton Energy Svcs. v. M-ILLC*, 514 F.3d 1244, 1249 (Fed. Cir. 2008) (citing *Athletic Alternatives, Inc. v. Prince Mfg., Inc.*, 73 F.3d 1573, 1581 (Fed. Cir. 1996)).

Plaintiff asserted independent claims 1 and 10 and dependent claims 2-8 and

11. Independent claim 1 of the ‘492 patent recites:

A system, comprising:
a Web server, including a processor and a memory, for offering one or more Web applications as respective point-of-service applications in a point-of-service application list on a Web page;
each Web application of the one or more Web applications for requesting a real-time Web transaction;
a value-added network (VAN) switch running on top of a facilities network selected from a group consisting of the World Wide Web, the Internet and an e-mail network, the
VAN switch for enabling the real-time Web transactions from the one or more Web applications;
a service network running on top of the facilities network for connecting through the Web server to a back-end transactional application; and
a computer system executing the Back-end transactional application for processing the transaction request in real-time

(‘492 patent, 9:50-67)

The limitations “value-added network (‘VAN’) switch,” “switching,” “service network,” and “computer system executing the back-end transactional application for processing the transaction request in real-time” are indefinite for the reasons set forth in the claim construction order. The court concludes, therefore, that independent claims 1 and 10 (which each contain three of these limitations) are invalid for indefiniteness.

Claims 2-8 are dependent on claim 1 and each recites the limitation “VAN switch.” Claim 3 additionally recites the limitation “switching,” claim 6 the limitation “service network,” and claim 8 the limitation “computer system.” Therefore, each of these dependent claims is invalid. Claim 11 depends on claim 10 and further describes that “the real-time Web transactions are Web transactions from the Web application accessing a value-added network service.” This description does not illuminate the meaning of the indefinite limitations “VAN switch,” “switching,” and “service network,” found in independent claim 10. Claim 11 is invalid. The court grants defendant’s motion for summary judgment of invalidity as to the asserted claims of the ‘492 patent.

2. The ‘500 patent

Plaintiff asserted independent claims 1, 10, and 35, as well as dependent claims 2-6, 12, 14-16 of the ‘500 patent. Independent claim 1 recites:

A configurable value-added network switch for enabling real-time transactions on a network, said configurable value-added network switch comprising:
means for switching to a transactional application in response to a user specification from a network application, said transactional application providing a user with a plurality of transactional services managed by at least one value-added network service provider, said value-added network service provider keeping a transaction flow captive, said plurality of transactional services being performed interactively and in real time;
means for transmitting a transaction request from said transactional application; and
means for processing said transaction request.

(‘500 patent, 9:44-58)

The court concluded that certain limitations of the asserted claims, “VAN switch,” “switching,” “value-added network system,” and each of the “means” limitations were indefinite for the reasons set forth in the claim construction order. Independent claim 1

and 35 each require the “means for switching,” “means for transmitting,” and “means for processing” limitations. Claim 1 additionally recites the “VAN switch” limitation and claim 35 the “value-added network system” limitation. Independent claim 10 recites the limitations “VAN switch” and “switching.” Therefore, independent claims 1, 10, and 35 are invalid for indefiniteness. Dependent claims 2-5 each recite the limitation “VAN switch” and add additional indefinite “means” limitations as discussed in the claim construction order. Each of dependent claims 2-5 is likewise invalid.

Dependent claim 6 recites: “The configurable value-added network switch as claimed in claim 5 wherein said host means contains data corresponding to said transaction request.” (‘500 patent, 10:17-20) The court concluded that dependent claim 5's limitation “means for coupling said means for transmitting to a host means” was indefinite as discussed in the claim construction order. The claim language of dependent claim 6 further defines the “host means,”¹ but does not clarify the meaning of “VAN switch,” therefore, claim 6 is invalid for indefiniteness.

Dependent claim 11 recites:

The method for configuring said value-added network switch as claimed in claim 10 wherein said step of switching to a transactional application further comprises the steps of:
receiving said user specification;
enabling a switch to said transactional application; and
activating said transactional application.

¹The limitation “host means” is a means-plus-function claim and, as discussed in the claim construction order, the specification provides insufficient structure. Claim 35 recites “a host means for processing.” (12:52) The limitation “host means” is indefinite.

('500 patent 10:49-54) The court analyzed the limitation "switching" in the claim construction order, concluding that the specification does not disclose how the VAN switch or the switching service (within the VAN switch) accomplishes "switching." Dependent claim 11 adds details to the limitation "switching to a transactional application in response to a user specification from a network application," however, these details do not further describe how the "receiving," "enabling," and "activating" would be accomplished. Therefore, the dependent claim does not provide definiteness to the limitations "VAN switch" or "switching," and dependent claim 11 is invalid for indefiniteness.

Dependent claim 12 recites:

The method for configuring said value-added network switch as claimed in claim 11 wherein said step of activating said transactional application further includes a step of creating a transaction link between said network application and said transactional application.

('500 patent, 10:55-60) This dependent claim adds the step of "creating a transaction link," but again does not provide any information on how this step would be accomplished by the invention. Therefore, dependent claim 12 does not supply definiteness to the limitations "VAN switch" or "switching," and is invalid for indefiniteness.

Similarly, dependent claim 14 provides information on the "step of receiving said user specification" in claim 11:

The method for configuring said value-added network switch as claimed in claim 11 wherein said step of receiving said user specification further comprises steps of:
presenting said user with a list of transactional applications, each of said transactional application being associated with a particular Internet service provider; and

submitting said user specification according to a user's selection of said transactional application from said list of transactional applications.

('500 patent, 11:2-12) The additional steps of "presenting said user with a list of transactional applications" and "submitting said user specification" do not illustrate how the "switching" is accomplished by the VAN switch (or the switching service) and, therefore, claim 14 is indefinite.

Dependent claim 15 further defines the "step of processing said transaction request" of claim 10 as " compris[ing] the step of transmitting said transaction request to a host means." (11:12-16) Dependent claim 16 further defines the "host means" of claim 15, as "contain[ing] data corresponding to said transaction request." Neither of these dependent claims clarify the indefinite limitations "VAN switch" or "switching;" these dependent claims (15 and 16) are invalid as indefinite. Based on the above analysis of each of the asserted claims, the court grants defendant's motion for summary judgment of invalidity as to each of the asserted claims of the '500 patent.

3. The '158 patent

Plaintiff asserted dependent claim 4 of the '158 patent, which claim depends from independent claim 1. Independent claim 1 of the '158 patent recites:

A method for performing a real time Web transaction from a Web application over a digital network atop the Web, the method comprising:
providing a Web page for display on a computer system coupled to an input device;
providing a point-of-service application as a selection within the Web page, wherein the point-of-service application provides access to both a checking and savings account, the point-of-service application operating in a service network atop the World Wide Web;
accepting a first signal from the Web user input device to select the point-of-service application;
accepting subsequent signals from the Web user input device; and

transferring funds from the checking account to the savings account in real-time utilizing a routed transactional data structure that is both complete and non-deferred, in addition to being specific to the point-of-service application, the routing occurring in response to the subsequent signals.

(‘158 patent, 9:40-10:15) Dependent claim 4 recites “[t]he method of claim 1, wherein object routing is used to complete the transfer of funds in a Web application.” (‘158 patent, 10:21-22)

The court concluded that the “service network” limitation, found in claim 1, is indefinite as detailed in the claim construction order. Claim 4’s further limitation of “object routing,” construed by the court as “system for transmitting data on a network using the TransWeb Management Protocol in which a unique IP address is hierarchically assigned to each object, e.g., each bank account,” does not further describe the indefinite limitation “service network.” Therefore, claim 4 is invalid for indefiniteness, and defendant’s motion for summary judgment is granted in this regard.

B. Enablement

“To be enabling, the specification of a patent must teach those skilled in the art how to make and use the full scope of the claimed invention without ‘undue experimentation.’” *ALZA Corp. v. Andrx Pharm., LLC*, 603 F.3d 935, 940 (Fed. Cir. 2010) (citations omitted). The specification need not disclose what is well-known in the art. *Genentech*, 108 F.3d at 1366. “[T]he rule that a specification need not disclose what is well known in the art is ‘merely a rule of supplementation, not a substitute for a basic enabling disclosure.’” *ALZA*, 603 F.3d at 940-41 (quoting *Auto. Techs. Int’l, Inc. v. BMW of N. Am., Inc.*, 501 F.3d 1274, 1282 (Fed. Cir. 2007)).

The three patents-in-suit share a specification, which purports to present “a configurable value-added network switching and object routing method and apparatus” (’492 patent, 9:38-39) The specification distinguishes the invention from Common Gateway Interface (“CGI”), a standard interface for running external programs on a web server, stating that “CGI scripts provide only limited two-way capabilities,” while the invention allows web merchants to “provide real-time transactional capabilities to users.” (*Id.*, 5:49-58) The specification presents the concept of a “VAN switch,” which allows “multi-protocol object routing.” (*Id.*, 7:62-63) However, the specification does not actually define, in language that would allow a person of ordinary skill in the art to make and use the invention, what a “VAN switch” is and how it accomplishes “object routing” or real-time transactions. Instead, the specification presents an abstract concept of real-time transactions, in which a merchant and a user interact. *Genentech*, 108 F.3d at 1366 (“Patent protection is granted in return for an enabling disclosure of an invention, not for vague intimations of general ideas that may or may not be workable.”).

The specification discloses a proprietary protocol, TransWeb™ Management Protocol (TMP), which the VAN switch may use to perform object routing. (’492 patent, 7:62-65) Plaintiff does not dispute that the protocol was never implemented. Plaintiff’s expert, Bardash, asserts that the patent describes a general protocol (D.I. 150, ex. AC at 9) and that

persons skilled in the art who could write the CGI code, having knowledge of the Pi-Net patents would have sufficient information to write a web server code implementing web applications. . . . Spielman’s complaint that development would take the work of dozens of software engineers, and several months of trial and error, assumes the development of a commercial-level product. The system can be implemented with far less

effort by a skilled artisan who knew web servers, CGI and similar basic skill sets.

(D.I. 150, ex. AB at 19) In contrast, Spielman² opines that “a person of skill in the art would essentially had to have developed her own protocol to implement and operate the claimed VAN Switch,” as the specification provides no description or guidance. (D.I. 150, ex. AJ at ¶ 53) Indeed, Bardash admits that a person of ordinary skill would need to write such a protocol, but argues that the patents provide guidance. The court agrees with Spielman that the implementation of the invention would require undue experimentation. (D.I. 150, ex. AJ) Spielman describes as an example that “TMP is described as incorporating, in the alternative, ‘s-HTTP, Java™, the WinSock API or ORB with DOLSIBs to perform object routing,” which “is counterintuitive,” and the specification does not offer any examples of how this can be accomplished. (D.I. 150, ex. AJ at ¶ 50)

In discussing the point-of-service application,³ Spielman opined that,

[a]lthough this portion of the specification describes what a Web [a]pplication, upon activation, should be able to do, there is no description as to how to perform the contemplated transactions. Again, the person of ordinary skill in the art would be entirely on her own when it comes to attempting to make and use the claimed Web application.

This opinion applies to any of the applications disclosed by the specification, i.e., the specification implicates, but does not describe, how to make or use point-of-service

²As discussed below in part V, plaintiff’s motion to exclude Spielman’s report is denied.

³According to the patents-in-suit, point-of-service applications allow a user “to connect to [b]ank services and utilize the application to perform banking transactions, thus accessing data from a host or data repository 575 in the Bank ‘Back Office.’” (‘492 patent, 6:65-7:9)

applications and transactional applications (construed as “a software program that transmits a user’s request for a service”) or back-end transactional applications⁴ (construed as “a software program that executes a user’s request for a service”). The specification offers no explanation or information on any software programs. Figure 8, which Bardash contends provides an “algorithm,” only discloses, as explained by Spielman, a flowchart with boxes listing functions. (D.I. 66 at ¶¶ 37; D.I. 150, ex. AJ at ¶¶ 78) As previously discussed in the claim construction order, each of the means-plus-function limitations and the “computer system” limitation require algorithms or other analogous structure, which the specification does not provide.

For the foregoing reasons, the court concludes that the specification does not enable one of skill in the art to make or use the invention without “undue experimentation.” “It is the specification, not the knowledge of one skilled in the art, that must supply the novel aspects of an invention in order to constitute adequate enablement.” *Genentech*, 108 F.3d at 1366. The specification distinguishes the prior CGI art, but is devoid of direction, guidance, and/or working examples of how the supposed superior invention is to be implemented. The claims are written in broad language, but the specification lacks any disclosures of how to practice the “real-time” transactions contemplated by the invention. Therefore, the asserted claims are invalid for lack of enablement.

⁴Each of the asserted claims implicates this limitation. Independent claim 1 of the ‘492 patent requires that a computer system process the transaction request in real time, and independent claim 10 requires using the VAN switch to switch to the back-end transactional application. The independent claims of the ‘500 patent require processing the transaction request. The asserted claim of the ‘158 patent requires using object routing to transfer funds.

C. Written description

“[T]he hallmark of written description is disclosure.” *Ariad*, 598 F.3d at 1351. A disclosure satisfies the written description requirement when it “allow[s] one skilled in the art to visualize or recognize the identity of the subject matter purportedly described.” *Enzo Biochem, Inc. v. Gen-Probe Inc.*, 323 F.3d 956, 968 (Fed. Cir. 2002). The disclosure does not have to “contain ‘either examples or an actual reduction to practice;’ rather, the critical inquiry is whether the patentee has provided a description that ‘in a definite way identifies the claimed invention’ in sufficient detail that a person of ordinary skill would understand that the inventor was in possession of it at the time of filing.” *Alcon Research Ltd. v. Barr Laboratories, Inc.*, 745 F.3d 1180, 1190-91 (Fed. Cir. 2014) (citing *Ariad*, 598 F.3d at 1350, 1352; *Koito Mfg. Co. v. Turn-Key-Tech, LLC*, 381 F.3d 1142, 1154 (Fed. Cir. 2004)).

The patented invention sets forth terms coined by the inventor: “VAN switch” and “point-of-service application.” The specification describes the “VAN switch” in conflicting and overlapping ways as discussed in the claim construction order. Figure 7 represents the VAN switch as having four components - “switching service 702,” “management service 703,” “boundary service 701,” and “application service 704.” (‘492 patent, fig 7) The specification provides no usable description or structure for any of these components. In this regard, Spielman opined that the specification offers “no context for where [the boundary service and switching service] begin and end, or how they relate to one another.” (D.I. 150, ex. AJ at ¶ 44) Moreover, the specification discloses TMP as a protocol used by the VAN switch to perform “object routing,” but

such a protocol was never implemented. Indeed, as discussed by Spielman, the specification “provide[s] no algorithms, source code, or any other descriptive language offering any guidance as to how to configure a VAN Switch so as to perform ‘realtime’ transactions using TMP or any other protocol.” (*Id.* at ¶ 48)

The court construed the “point-of-service application” as “a software program that transmits a user’s request for a service.” The specification describes these “point-of-service applications” by block diagrams denoting “Bank 510(1), Car Dealer 510(2) or Pizzeria 510(3),” but offers no further description of any of the requests for service available to a user. (‘492 patent, fig 5C, 6:51-55) The specification similarly lacks any details as to how the VAN switch would accomplish allowing a user to connect to a point-of-service application.

Each of the asserted claims implicates the back-end transactional application, which processes the user’s request. However, the specification only offers a block diagram of a “back-office,” generally identifying a system and applications. (*Id.*, fig. 4B) Nowhere in the specification does the inventor indicate that she had possession of such a system or the applications that process the user’s request. The crux of the invention is “real-time” transactions for the user; there is no disclosure of how these occur. The court concludes that the patents-in-suit are invalid for lack of written description.

D. Infringement

As the court finds certain claim limitations indefinite for each of the patents-in-suit, the court cannot complete a meaningful infringement analysis. See *Markman*, 52 F.3d at 976. Additionally, all the asserted claims are invalid, therefore, by operation of

law they are not infringed. *Exergen Corp. v. Wal-Mart Stores, Inc.*, 575 F.3d 1312, 1320 (Fed. Cir. 2009) (“invalid claim[s] cannot give rise to liability for infringement”) (citation omitted). Moreover, “[o]ne who does not infringe an independent claim cannot infringe a claim dependent on (and thus containing all the limitations of) that claim.” *Wahpeton Canvas.*, 870 F.2d at 1553 & n.9. For these reasons, the court grants defendant’s motion for non-infringement of all asserted claims of the patents-in-suit.

V. MOTION TO EXCLUDE

Plaintiff moves to exclude Spielman’s testimony and strike her reports⁵ based on the fact that she did not apply “any construction of any claim limitation in any of her invalidity analyses.”⁶ (D.I. 116 at 5) The court addresses the motion as it relates to excluding the reports.⁷ As to the indefiniteness of the asserted claims, Spielman focused on the limitations “VAN switch,” “routed transactional data structure,” “keeping a transaction flow captive,” the application limitations, and the means-plus-function limitations, including the “computer system” required in claim 1 of the ‘492 patent. Defendant did not propose a construction for these limitations, instead arguing that each limitation was indefinite, which position was explained by Spielman for each limitation. Spielman did not provide a complete analysis of whether plaintiff’s proposed

⁵Plaintiff’s motion refers to Spielman’s initial report (D.I. 150, ex. AJ) and reply report (D.I. 150, ex. AK), but does not indicate which report plaintiff requests that the court strike. (D.I. 116 at 2) The court’s decision applies to both reports.

⁶Plaintiff also argues that Spielman did not analyze the PTO constructions. However, Spielman was not required to address such. Plaintiff’s references to the “court’s constructions” are premature as the court had not yet issued constructions.

⁷As no issues remain for trial, plaintiff’s motion as it relates to Spielman’s trial testimony is moot.

construction for each of these limitations would also render the claims indefinite. Spielman's reports are properly considered for the analysis contained therein, including Spielman's opinions regarding how the indefiniteness of the limitations affect the indefiniteness of the claim.

Plaintiff faults Spielman's opinions regarding written description and enablement for not considering any construction of claims, or addressing specific claims. Spielman opines that "all asserted claims in the '500 patent and the '492 patent require a VAN switch or VAN system," and then explains why the VAN switch is not adequately described or enabled. Moreover, defendant argued that the term was indefinite, thus not amenable to construction. Spielman's explanations comport with this argument. As to enablement, Spielman opines that several of the *Wands* factors are not met, including the quantity of experimentation necessary, the amount of direction or guidance presented, the absence of working examples, and the nature of the invention. She then uses these factors to conclude that "the patents-in-suit failed to enable one skilled in the art to understand, make, and use the full scope of the subject-matter of the asserted claims." (D.I. 150, ex. AJ at ¶ 79)

As to written description, Spielman opined, for example, that "a person of skill in the art as of the date of the alleged invention would not have understood from the specification of the patents-in-suit that the patentee had possession of a VAN [s]witch configurable to perform 'real-time' transactions." (D.I. 150, ex. AJ at ¶ 46) Spielman supported her conclusion with explanations as to why the specification did not "describe an invention understandable to that skilled artisan." While plaintiff may disagree with

these conclusions, this disagreement does not make the reports inadmissible.

Plaintiff's motion to strike the reports is denied.

VI. CONCLUSION

For the foregoing reasons, the court grants defendant's motion for summary judgment of non-infringement (D.I. 113) and defendant's motion for summary judgment of invalidity of the patents-in-suit (D.I. 121). The court denies plaintiff's motion to exclude the testimony of Susan Spielman.⁸ (D.I. 115) An appropriate order shall issue.

⁸The remaining motions, defendant's motion for partial summary judgment of laches for the '500 patent (D.I. 111) and plaintiff's motion to strike defendant's opening brief in support of its partial summary judgment of laches for the '500 patent (D.I. 132), as well as the parties' motions to exclude testimony (D.I. 109; D.I. 117; D.I. 119), are denied as moot as no issues remain for trial.