CLAIM INTERPRETATION: A CLAIM INDEFINITENESS ANALYSIS PROPOSAL

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I. Introduction

A. One skilled in the art should not have to wait until a court interprets the language of a patent claim before its scope can be determined

In recent years, patent infringement litigation has increased dramatically and, not surprisingly, courts are often asked to resolve disputes over the meaning of claim language before they can determine whether an accused device or process infringes.¹ Whenever a circumstance² occurs which gives rise to such a

2. Expressions:

- a. Use of the phrase "partially soluble" was deemed not sufficiently precise to satisfy 35 U.S.C. § 112 ¶ 2 (2006). Standard Oil Co. v. Am. Cyanamid Co., 585 F. Supp. 1481, 1490 (E.D. La. 1984). A court may read the modifier "substantially" into a claim, however, particularly where a limitation is couched in functional rather than numerical terms. Unisplay S.A. v. Am. Elec. Sign Co., 28 U.S.P.Q.2d (BNA) 1721, 1737 (E.D. Wash. 1993), *aff'd in part, vacated in part*, 69 F.3d 512 (Fed. Cir. 1995).
- b. Use of the ambiguous word "about" is long-established practice in the United States Patent and Trademark Office (USPTO), but requires consideration of the prior art and the file history of the application to determine how much the qualifying of a numerical value with that word extends the claim beyond that numerical value. *See* Conopco, Inc. v. May Dep't Stores Co., 784 F. Supp. 648, 670 (E.D. Mo. 1992). The word "about" does not have a universal meaning in patent claims; its depends upon the facts in each case. *See id.*

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A court must always interpret a claim before patent infringement can be determined. *See*, *e.g.*, Markman v. Westview Instruments, Inc., 517 U.S. 370, 372–73 (1996). However, disputes do not always arise over the meaning of claim terms.

Circumstances which can give rise to disputes over the meaning of claim language, i.e., claim indefiniteness:

^{1.} Lack of antecedent basis. Sometimes the absence of an antecedent basis is not enough to render the claim so indefinite that it warrants rejection. *See Ex parte Dill*, 214 U.S.P.Q. (BNA) 387, 390–91 (B.P.A.I. 1981).

dispute, for example an issue of claim indefiniteness where a claim term appears to be ambiguous, a court resolves the issue by interpreting the ambiguous term. In those instances, courts, at their discretion, can rely on evidence outside of the patent specification and prosecution history to interpret the ambiguous claim language, if the ambiguity can not be resolved without such evidence.³ An ac-

In *Herman v. William Brooks Shoe Co.*, Herman sued William Brooks for infringement of U.S. Patent No. 4,550,446 (filed Mar. 31, 1982). 54 U.S.P.Q.2d (BNA) 1046 (S.D.N.Y. 2000). The patent is directed to a "sock-type article . . . to be worn on the foot." *Id.* at 1050.

c. Use of ambiguous words such as "close to," "close proximity," "closely approximate," "in abutment with," "joined," and "connected" are not deemed to render a claim indefinite as long as they (1) define a relationship as precisely as the subject matter permits; and (2) "apprise those skilled in the art both of the utilization and scope of the invention" when read in light of the specification. See Andrew Corp. v. Gabriel Elecs., Inc., 847 F.2d 819, 821–22 (Fed. Cir. 1988) (internal citation omitted); Rosemount, Inc. v. Beckman Instruments, Inc., 727 F.2d 1540, 1546–47 (Fed. Cir. 1984). Nevertheless, a court needs to interpret such words in the context of the claim to determine the claim's scope. See Andrew Corp., 847 F.2d at 822.

d. Use of "whereby" and "so that" clauses are proper where the previously-recited structure in the description will necessarily and inherently generate the result which follows those words. *See Ex parte* Howarth, 26 U.S.P.Q. (BNA) 334, 335–36 (B.P.A.I. 1935).

^{3.} Use of relative terminology (e.g., terms of degrees) does not automatically render a claim indefinite. Allergan Sales, Inc. v. Pharmacia & Upjohn, Inc., 42 U.S.P.Q.2d (BNA) 1560, 1563 (S.D. Cal. 1997). The patent specification must provide some standard for measuring that degree. *Id.* If the question of "relative to what" can be answered, the use of relative terminology does not render a claim impermissibly indefinite. *Id.*

E.g., Scholle Corp. v. Liqui-Box Corp., 56 U.S.P.Q.2d (BNA) 1138 (C.D. Cal. 2000). In Scholle Corp., Scholle sued Liqui-Box for infringement of U.S. Patent No. 4,445,550 ("the '550 patent'). Id. at 1139. Both companies manufacture similar devices, which are used by commercial food processors to store foods such as tomato paste. Id. "The invention described and claimed in the '550 [platent is a plastic bag with [an] attached plastic fitment [], which connects to an asceptic filling machine. . . . In typical use, a filling machine sterilizes the [plaintiff's] fitment surface and ruptures the membrane with a metal fill tube. The machine then fills the bag with food product and installs a seal across the fitment." Id. at 1139-40. The Liqui-Box product "is designed for the same uses as the '550 Fitment" except that its fitment includes a rigid plug that is unrupturable. Id. at 1140. "In typical use, a filling machine sterilizes the [defendant's] fitment surface and pushes the plug away from the fitment body and into the bag. The machine then fills the bag with food product and installs a seal across the fitment." Id. The plaintiff moved to strike the testimony of the defendant's expert who provided his opinion on the meaning of the term "rupturable" in the claims of the patent. Id. This motion was denied although it appears that the court relied on a dictionary to establish the "ordinary meaning" of the term, rather than on the expert's opinion of its meaning. Id. at 1141. The court recognized, however, that "[i]f intrinsic evidence does not resolve an ambiguity in a disputed term, the Court may also consider extrinsic evidence such as expert testimony." Id.

cused infringer cannot, however, possibly determine with any reasonable degree of certainty how the court will construe ambiguous language because, prior to trial, it will not be apparent which evidence the court will rely on or how it will be interpreted. Quite often, one has to wait until a court interprets the language of a patent claim before the scope of the claim can be determined;⁴ in other

The defendant filed a motion for summary judgment challenging the validity of the plaintiff's patent because it was anticipated by an earlier patent, U.S. Patent No. 4.204,345 (filed Dec. 1, 1977). Id. at 1047. The plaintiff admitted that the Bradley patent contains most elements of claim 1 in his '446 patent. Id. at 1048. However, he contended that his patent claims a "breathable' waterproof sock-like device" whereas the Bradley patent "teaches a waterproof sock-like device that is not 'breathable." Id. The dispute was "reduced to a debate over the [meaning] of plaintiff's 'breathable' [sock] and Bradley's 'air-permeable' [sock]." Id. The court construed the language by relying on extrinsic evidence in the form of a dictionary meaning of the word "breathable." Id. at 1049. The plaintiff introduced the testimony of an expert to explain the meaning of the term, but the court concluded that "notwithstanding plaintiff's resort to" expert testimony, it was already clear from other extrinsic evidence (i.e., the dictionary) that plaintiff's claim 1 reads on the Bradley patent. *Id.* at 1051. In general, the court said that when "construing patent claims, the courts must generally confine their review to intrinsic evidence, but may resort to extrinsic evidence where intrinsic evidence is insufficient to resolve ambiguity in a disputed claim term." Id. at 1048 (internal citation omitted).

In Storage Tech. Corp. v. Cisco Tech., Inc., Storage Technology sued Cisco for infringement of U.S. Patent No. 5,842,040 (filed Jun. 18, 1996). 329 F.3d 823 (Fed. Cir. 2003). The plaintiff challenged the district court's interpretation of two limitations in the claims of the '040 patent. Id. at 830. The Court of Appeals for the Federal Circuit (CAFC) said that to "[r]esort to extrinsic evidence is appropriate only when an ambiguity remains after consulting the intrinsic evidence of record." Id. at 832. However, in this case, "the district court did not use the extrinsic evidence to assist in defining a claim limitation, but rather used it to limit claim scope based on the purpose of the invention, which is impermissible." Id. The CAFC said that the district court improperly relied on extrinsic evidence in the form of a declaration by Cisco's expert to support its construction of the claims, but only because it appeared that the expert was reading additional limitations into the claims. Id. On another disputed claim term, the CAFC said that "[w]e begin with the ordinary meaning of the disputed claim term" (i.e., dictionary meaning) even though both parties attempted to "direct [the court's] attention to the intrinsic record, i.e., the written description and the prosecution history." Id. at 833 (emphasis added).

If it is necessary for a court to interpret the meaning of claim terms, the claim is not sufficiently precise and definite for one skilled in the art to have been given a clear warning as to what constitutes infringement prior to being charged with infringement. See 35 U.S.C. § 112 (2006). Some patent holders take advantage of such claims which, when combined with severe potential remedies such as injunctions and enhanced damages for willful infringement, give them leverage to extract lucrative settlements from those they accuse of infringement. The impact on an accused infringer can be significant, as he prepares to defend against a charge of claim infringement, because the claim does not satisfy its dual purpose, which the U.S. Supreme Court refers to as its definitional and public notice functions. Hilton Davis Chem. Co. v. Warner-Jenkinson Co., 520 U.S. 17, 29 (1997).

words, one has to wait until being accused of infringement of the claim.⁵ But should an accused infringer need a trial before he can determine, with any reasonable degree of certainty, what activities would likely infringe a patent claim?

In order to avoid having to rely on a court to explain the boundaries of protection circumscribed by the claims of a patent, this author proposes a standard methodology for interpreting claim language (for analyzing claim indefiniteness) with a high degree of certainty. Not only does this proposal make it easier to discern which activities will likely infringe a patent prior to trial, but it also provides a predictable method for resolving claim interpretation disputes during trial.⁶

B. Statutory requirements pertinent to the interpretation of patent claims—the "definiteness" requirement

Under 35 U.S.C. § 112 ¶ 2, claims in a patent must be particular and distinct;⁷ that is, they must be precise and definite. The primary purpose of the

[t]he developed and improved condition of the patent law, and of the principles which govern the exclusive rights conferred by it, leave no excuse for ambiguous language or vague descriptions. The public should not be deprived of rights supposed to belong to it, without being clearly told what it is that limits these rights.... It seems to us that nothing can be more just and fair, both to the patentee and to the public, than that the former should understand, and correctly describe, just what he has invented, and for what he claims a patent.

It is actually repugnant to long-standing principles of patent jurisprudence that one reasonably skilled in the art would have to be accused of infringement of a patent claim in order to discern the boundaries of the claim, i.e., that one would have to wait for a court to interpret the claim

Judge Paul Michel, Chief Judge of the Court of Appeals for the Federal Circuit (CAFC), recently said that "[c]hanges in claim construction methods and standards...hold the best potential... to avoid needless lawsuits...." Hon. Paul R. Michel, Chief Judge, CAFC, Address to the 2006 FICPI World Congress, Optimizing the Balance between Patentees and Rivals (May 23, 2006) at *4 available at http://ficpi.org/library/PARIScongress/3-Michel_(revisedFinal).pdf. In his speech, Judge Michel also talked about the importance of the "public notice" function of patent claims, and specifically proposed limiting the sources of claim construction to the "patent file." *Id.* at *3–4. He also recommended limiting expert testimony. *Id.* at *4.

⁷ 35 U.S.C. § 112 ¶ 2 (2006). The inclusion of a claim in a patent application became a statutory requirement in the Patent Act of 1870, ch. 230, 16 Stat. 201, § 26 (current version at 35 U.S.C. § 112 (2006)). The idea that the claim is more important than the description and the drawings developed around the time of the Act. In *Merrill v. Yeomans*, the U.S. Supreme Court said:

"definiteness" requirement is to provide clear warning to the public as to what constitutes infringement of the patent. That is, a claim must be definite for the purpose of providing those who attempt to understand its scope with the adequate notice demanded by due process of law. This allows a competitor the ability to clearly and accurately determine the boundaries of the patent's protection and, consequently, to evaluate the possibility of infringement before the competitor starts any activity that falls within the scope of the patent claims.

94 U.S. 568, 573–74 (1876). In fact, the requirement stated in 35 U.S.C. \S 112 \P 2 existed long before the present statute came into force. *In re* Hammack, 427 F.2d 1378, 1382 (C.C.P.A. 1970). "Its purpose is to provide those who would endeavor, in future enterprise, to approach the area circumscribed by the claims of a patent, *with the adequate notice demanded by due process of law*, so that they may more readily and accurately determine the boundaries of protection involved and evaluate the possibility of infringement and dominance." *Id.* (emphasis added).

The attitude of the U.S. Supreme Court toward the required definiteness of claims fluctuated over time. In the nineteenth century, decisions such as *Merrill*, 94 U.S. at 573–74, and *Keystone Bridge Co. v. Phoenix Iron Co.*, 95 U.S. 274, 278 (1877), indicated a strict attitude, i.e., the need for clear claims precisely tailored to the applicant's invention. In the early twentieth century, the Court showed more liberality. In *Carnegie Steel Co. v. Cambria Iron Co.*, the Court stressed that "[t]he claim of a patent must always be explained by and read in connection with the specification" and that claim language "is not addressed to lawyers, or even to the public generally," but to persons in the relevant art. 185 U.S. 403, 432, 437 (1902). After 1930, the Supreme Court seemed to return to its earlier attitude of the requirement of definiteness. Particularly, in *General Electric Co. v. Wabash Appliance Corp.*, the Court said that (referring to the equivalent of the current version of 35 U.S.C. § 112)

[t]he statute seeks to guard against unreasonable advantages to the patentee and disadvantages to others arising from uncertainty as to their rights. The inventor must inform the public during the life of the patent of the limits of the monopoly asserted, so that it may be known which features may be safely used or manufactured without a license and which may not.

304 U.S. 364, 369 (1938) (internal quotations omitted); *see also* Hilton Davis Chemical Co. v. Warner-Jenkison Co., 62 F.3d 1512, 1570 (Fed. Cir. 1995) (en banc), (Nies, J., dissenting) ("During the 1930's and 1940's, the Supreme Court spoke frequently about the criticality of claim language so as to provide the public with notice of protected rights and to encourage innovation by others."), *rev'd*, 520 U.S. 17 (1997).

The test for definiteness is whether the claims, when "read in the light of the specifications, reasonably apprise those skilled in the art both of the utilization and scope of the invention..." Georgia-Pacific Corp. v. U.S. Plywood Corp., 258 F.2d 124, 136 (2d Cir. 1958); see also Amgen, Inc. v. Chugai Pharm. Co., 927 F.2d 1200, 1217 (Fed. Cir. 1991); Shatterproof Glass Corp. v. Libbey-Owens Ford Co., 758 F.2d 613, 624 (Fed. Cir. 1985).

C. Claim interpretation for infringement purposes—when a claim does not meet the "definiteness" requirement

The first step in determining whether or not a patent claim is infringed requires proper construction (or interpretation of the meaning) of the claim language.9 Courts have the power and the obligation to interpret, as a matter of law, the meaning of language used in a claim. 10 They can use intrinsic evidence, which includes the claim language in its entirety, the description of the invention and the prosecution history, as well as other (extrinsic) evidence for that purpose. 11 When claim ambiguities arise, 12 e.g., when a dispute arises as to the meaning of a claim term, a court interprets the meaning of the ambiguous claim term. The court, at its discretion, can rely on evidence outside of the patentee's description of the invention and the prosecution history to resolve the ambiguity. Prior to trial, however, the extrinsic evidence on which the court chooses to rely will not be known to one skilled in the art. That is, prior to trial, an accused infringer cannot possibly determine how ambiguous language will be construed by the court since it will not be apparent which evidence, extrinsic to the patentee's specification and prosecution history, the court will rely on to resolve the ambiguity. For example, an accused infringer would not know, with any certainty, which dictionary a court would consider to be the definitive source for the definition of an ambiguous term in a claim.

Until the court decides that it will be necessary to rely on extrinsic evidence to interpret claim language, it might not be apparent even to one skilled in the art that reference to such evidence would be necessary to construe the claim language. Furthermore, the extrinsic evidence relied on likely did not play a part in the creation of the patent. Clearly, if the court feels compelled to resort to extrinsic evidence to interpret the claim, the purpose behind the "definite-

The court construes claims after holding what has become known as a "Markman hearing," which is named after *Markman v. Westview Instruments, Inc.*, 517 U.S. 370 (1996).

See Cybor Corp. v. FAS Techs., 138 F.3d 1448, 1451 (Fed. Cir. 1998).

The majority opinion in the *Markman* case discussed the principles governing claim interpretation including the role of the specification, prosecution history, and extrinsic evidence.

Even though it is the patent applicant's burden to precisely define the invention in order to "provide clear warning," sometimes circumstances occur which give rise to claim ambiguities. In those instances, the public is not given clear warning because it is unable to determine, with any degree of certainty, what the patentee's boundaries of protection are and what would constitute infringement of the claims. Such claims do not give the notice required by the statute, which is in direct contravention of the public interest that Congress recognized and sought to protect. *See*, *e.g.*, Warner-Jenkinson Co. v. Hilton Davis Chemical Co., 520 U.S. 17, 28–29 (1997) (indicating that the U.S. Supreme Court recognizes the public notice function of claims in view of the second paragraph of 35 U.S.C. § 112).

ness" requirement of 35 U.S.C. § 112 ¶ 2 was not met. 13 The harmful impact that patent claims which do not meet this statutory requirement have on the private, as well as on the public sector, is one reason why so much concern has been expressed about the patent system.14

D. The impact of not meeting the statutory requirement of "definiteness"

It is now more important than ever for members of the public, specifically those of reasonable skill in the art, to be able to properly interpret the language of a patent claim in order to understand its scope; that is, they need to understand what activities will likely fall within the scope of the claim. The problem that ensues when claims cannot be interpreted properly, e.g., because they include ambiguous terms, applies to any patent. The problem is of greater magnitude in the information technology ("IT") industry because allegations of infringement of a single patented invention can have a ripple effect in both the public and private sectors. More and more patents are issuing every year covering a wide range of IT inventions that are often implemented in interoperable, multi-platform, multi-vendor, widely distributed, and increasingly complex solutions. At the same time, business processes and governmental services are becoming more complex, interdependent on one each other, and highly dependent upon many of those complex solutions for their operation. In view of the deleterious impact that a charge of infringement of the claims of an IT-related patent can have on the efficient operation of an important business process or governmental service (e.g., the effect of restraining orders, the potential for enhanced damages, the cost and time to prepare a defense, the cost to switch to a different solution), one skilled in the art must know, with reasonable certainty,

See 35 U.S.C. § 112 ¶ 2 (2006).

A critical element for improving the patent system is for courts to ensure that issued patents satisfy their definitional and public notice requirements in view of 35 U.S.C. § 112 ¶ 2. The purpose of that section is to provide those who attempt to understand the scope of the claims of a patent with adequate notice so that they will be able to clearly and accurately determine the boundaries of protection provided by the claims and evaluate the possibility of infringement before they are accused of infringement. Sometimes claims are allowed by the USPTO that are not sufficiently precise for one to have been given a clear warning as to what constitutes infringement. This can give rise to disagreements as to the scope of the claims and can result in a charge of infringement by the patent holder. These disagreements can only be resolved by a court. But one should not have to be charged with infringement before discerning what is meant by the claims. In general, members of the public must be able to read a patent and know what is, and is not, infringement of the patent. See Ex Parte Brummer, 12 U.S.P.Q.2d (BNA) 1653, 1655 (B.P.A.I. 1989).

the scope of what the inventor/patentee regards as his invention by being able to properly interpret the claims of the patent when it issues.

II. ATTEMPTS TO CLARIFY CLAIM INTERPRETATION METHODOLOGY

A. Divergent views of claim construction prior to Phillips v. AWH Corp.¹⁵

It was thought that the issue of patent claim construction was settled by Markman v. Westview Instruments, Inc. 16 Even though the Court of Appeals for the Federal Circuit (CAFC) discussed the two-step test for assessing patent infringement,¹⁷ the Markman opinion did not provide specific guidance as to how a district court should use intrinsic and extrinsic evidence¹⁸ to interpret the meaning of language used in a patent claim. When considering extrinsic evidence, it merely stated that a court can use its discretion.¹⁹

Since the Markman decisions, the CAFC has presented several competing claim construction theories. In Vitronics Corp. v. Conceptronic, Inc., 20 the CAFC indicated that patent claims should be construed in light of the claims, specification, and file history (i.e., intrinsic evidence).²¹ The court noted that ordinarily this would allow the scope of a patent to be determined with reasonable certainty.²² On the other hand, the Texas Digital Systems, Inc. v. Telegenix, Inc.²³ court placed more emphasis on the use of extrinsic evidence when performing claim construction analysis.²⁴ In *Texas Digital*, the CAFC stated that

Intrinsic evidence, which is fixed at the time the patent is granted, includes the description in the patent, the patent claims, and the prosecution history (if the history was in evidence), and extrinsic evidence includes all evidence external to the patent such as dictionaries, treatises, and expert and inventor testimony. Id. at 979-80.

¹⁵ 415 F.3d 1303 (Fed. Cir. 2005).

⁵² F.3d 967 (Fed. Cir. 1995), aff'd, 517 U.S. 370 (1996).

Id. at 980. Nevertheless, extrinsic sources of evidence could not be used to contradict or vary claim terms. Id. at 981. The significance of Markman was that it held that "the court has the power and obligation to construe as a matter of law the meaning of language used in the patent claim." Id. at 979.

⁹⁰ F.3d 1576 (Fed. Cir. 1996).

²¹ Id. at 1582-83.

Id. at 1583.

³⁰⁸ F.3d 1193 (Fed. Cir. 2002).

Id. at 1202-03. But note that the court does not categorize these materials as "extrinsic evidence." Id. at 1203.

the specification should be consulted only after a determination is made, whether based on a dictionary, treatise, or other source, as to the ordinary meaning of the claim term in dispute.²⁵ That is, claim terms should be construed based on their ordinary meaning as provided in dictionaries or treatises.²⁶ Recourse to the specification would only be necessary to serve as a check on the dictionary meaning, i.e., to determine if the inventor provided an explicit definition of the term different from its ordinary meaning or if the inventor excluded one of the meanings obtained from the dictionary.²⁷ The court explained that it "advanced the methodology set forth in that opinion in an effort to combat what this court has termed 'one of the cardinal sins of patent law—reading a limitation from the written description into the claims."28

B. The Phillips case

In 2004, the CAFC granted rehearing en banc of Phillips v. AWH Corp. 29 ("Phillips II") to resolve the divergent views on claim interpretation that emerged following Markman. The case was also selected presumably because the technology³⁰ was easy to understand.

The invention involved modular steel-shell panels that were welded together to form vandalism-resistant walls for use in prison facilities.³¹ The term "baffle," which is recited in each claim, was used to describe an element extending inwardly from the steel-shell panels,32 but the specification did not include any detailed description of its structure. The parties agreed that the accused

26 Id. at 1203-04.

²⁵ Id. at 1204.

Id at 1204-05.

Phillips v. AWH Corp. (Phillips III), 415 F.3d 1303, 1319-20 (Fed. Cir. 2005) (discussing the Texas Digital opinion).

Phillips v. AWH Corp. (Phillips II), 376 F.3d 1382 (Fed. Cir. 2004). In its order to rehear the *Phillips* appeal en banc, the CAFC identified seven questions that it hoped to consider. *Id* at 1383. However, the court said that the "principal question that this case presents to us is the extent to which we should resort to and rely on a patent's specification in seeking to ascertain the proper scope of its claims." Phillips III, 415 F.3d at 1312. The CAFC also recognized that it had to clarify the use of dictionaries in claim construction. Id.

See U.S. Patent No. 4,677,798 (filed Apr. 14, 1986).

Phillips III, 415 F.3d at 1309. The walls comprise two steel-shell panels that contain baffles angled so as to deflect projectiles such as bullets from reaching the back panel. Id. at 1310-

For example, claim 1 recites "internal steel baffles extending inwardly from the steel-shell walls." Id. at 1311.

product also had internal steel elements that extended perpendicularly inward from steel-shell walls.³³

The primary claim interpretation issue was whether the claim term "baffles" included elements that were positioned perpendicularly to the steel-shell walls, as in the accused products, or whether the claimed baffles were limited to non-perpendicularly projecting elements.³⁴ Since the district court concluded that "load bearing means," of which the "baffle" was a part, was drafted in a means-plus-function format, it applied 35 U.S.C. § 112 ¶ 6 and interpreted "baffle" to require extending at an angle other than ninety degrees to the wall faces.³⁵ On appeal to the CAFC panel, the court determined that "baffle" was a structural limitation and, thus, found that the district court's application of § 112 ¶ 6 to the disputed term was in error.³⁶ The CAFC, nevertheless upheld the district court's interpretation, which limited "baffle" by its angular position with respect to the steel-shell walls.³⁷

In its en banc opinion,³⁸ the *Phillips III* court discussed the problems that arise when too much reliance is placed on extrinsic evidence, particularly dictionaries, and when use of extrinsic evidence is appropriate to resolve claim ambiguities.³⁹ It also repudiated the use of extrinsic evidence initially to determine "ordinary meaning" of claim terms.⁴⁰

Specifically, the CAFC reaffirmed the *Vitronics* decision.⁴¹ The court said that the *best* source for understanding a technical term is the specification from which it arose, *although it would still be left up to the district courts "to attach the appropriate weight . . . to those sources in light of the statutes and*

It does not expressly state this, but there is no argument to the contrary. See id.

³⁴ *Phillips III*, 415 F.3d 1303, 1309 (Fed. Cir. 2005).

³⁵ *Id.*; see 35 U.S.C. § 112 ¶ 6 (2006).

³⁶ *Phillips III*, 415 F.3d at 1310.

Id. Although the parties agreed that the dictionary definition of "baffles" was "something for obstructing, impeding, or checking the flow," AWH contended that the baffles must be angled so as to deflect projectiles such as bullets. Id. The district court agreed with AWH and entered summary judgment of non-infringement in its favor. Id. at 1309. Since only structures extending at acute or obtuse angles could deflect projectiles, and because the specification did not include any structure extending at 90 degrees from the wall faces, the CAFC panel also concluded that "baffle" was limited to structures extending at angles other than 90 degrees from the wall faces. Id. at 1310.

It was a split decision in which nine of the twelve judges agreed with the complete analysis of the majority decision. Two other judges agreed with most of the majority opinion, but disagreed with respect to some points. The remaining judge wrote a dissenting opinion.

³⁹ *Id.* at 1321

⁴⁰ Phillips III, 415 F.3d 1303, 1318 (Fed. Cir. 2005).

⁴¹ *Id.* at 1324.

policies [of] patent law."⁴² Since the close relationship between the written description and the claims is enforced by the statutory requirement that the specification describe the claimed invention in "full, clear, concise, and exact terms," district courts would be expected to rely on the patent specification to a *great extent* when construing claim language.⁴³

The court also stated that intrinsic evidence, not dictionaries, should be used to determine the ordinary meaning of patent claim terms because the use of a dictionary meaning "divorced from the context of the written description" could extend patent protection beyond what should properly be afforded to the inventor.⁴⁴ The court identified specific situations in which dictionaries could be used,⁴⁵ but did not intend to preclude any appropriate use of dictionaries "so long as the dictionary definition does not contradict any definition found in or ascertained by a reading of the [intrinsic evidence]."⁴⁶ It is still left to the district courts to "keep in mind the flaws inherent in each type of evidence and

The court identifies situations in which various sources of evidence, both intrinsic as well as extrinsic, could be consulted. In particular, the court:

- 1) suggests consulting "those sources available to the public that show what a person of skill in the art would have understood disputed claim language to mean." *Id.* at 1314. When interpreting a term that may have a particular meaning in the field of art, the court should look to "the words of the claims themselves, the remainder of the specification, the prosecution history, and extrinsic evidence concerning relevant scientific principles, the meaning of technical terms, and the state of the art." *Id.*
- 2) indicates when dictionaries could be used. *Id.* at 1324. A general-purpose dictionary might be helpful to assist in the understanding of the commonly understood meaning or words. *Id.* Technical dictionaries may help "to better understand the underlying technology' and the way in which one of skill in the art might use the claim terms." *Id.* at 1318. "[A] general-[purpose] dictionary cannot overcome art-specific evidence of the meaning' of a claim term." *Id.* at 1322.
- 3) states when the prosecution history could be consulted. *Id.* at 1317. "The purpose of consulting the prosecution history in construing a claim is to 'exclude any interpretation that was disclaimed during prosecution." *Id.* (quoting Chimie v. PPG Indus., Inc., 402 F.3d 1371, 1384 (Fed. Cir. 2005) (quoting ZMI Corp. v. Cardiac Resuscitator Corp., 884 F.2d 1576, 1580 (Fed. Cir. 1988)).
- 4) identifies several situations in which expert testimony could be useful. *Id.* at 1318. Expert testimony "can be useful... to provide background on the technology at issue, to explain how an invention works... or to establish that a particular term in the patent or the prior art has a particular meaning in the pertinent field." *Id.*

⁴² *Id.* (emphasis added).

⁴³ *Id.* at 1316 (quoting 35 U.S.C. § 112 ¶ 1 (2006)).

⁴⁴ Id at 1321

⁴⁶ *Phillips III*, 415 F.3d 1303, 1322–23 (Fed. Cir. 2005).

assess that evidence accordingly."⁴⁷ That is, the CAFC left it up to the district courts to decide if extrinsic evidence would be helpful to determine the true meaning of the language in patent claims.⁴⁸

C. Weaknesses of the CAFC's decision in Phillips—uncertainty remains

Following the *Phillips III* decision, there is still confusion⁴⁹ as to how, and to what extent, district courts will use extrinsic evidence to interpret claim language. Although the decision is favorable in several respects, because it suggests the extent to which a court should rely on a patent's specification when construing patent claim terms and it clarifies when use of dictionaries would be appropriate, it does not go far enough to reduce uncertainty when claims are interpreted. The major problems with the *Phillips III* decision are that it 1) does not require a standard process for claim construction; 2) suggests that expert testimony could be useful for a variety of reasons; 3) states that the time when one determines the meaning of claim terms is the time of the invention, i.e., the effective filing date of the invention; and 4) would permit claims to be given their broadest reasonable construction in light of the specification in those instances in which a claim term is still ambiguous after considering the intrinsic evidence (the claims, specification and file history).⁵⁰

⁴⁷ *Id.* at 1319.

⁴⁸ See id.

Despite *Phillips III*, district courts have not always used extrinsic evidence properly. In *Curtiss-Wright Flow Control Corp. v. Velan, Inc.*, the CAFC stated that the district court placed "too much emphasis on the ordinary meaning of 'adjustable' without adequate grounding of that term within the context of the specification" 438 F.3d 1374, 1378 (Fed. Cir. 2006). The court's construction of the term based solely on its ordinary meaning "finds no support in the overall context of the . . . specification" and thereby "renders that limitation nearly meaningless." *Id.* at 1379. The CAFC stated that "[t]he specification provides [the] context and substantial guidance on the meaning of 'adjustable." *Id.* at 1380. Relying on *Phillips III*, the CAFC determined that the ordinary meaning of the word "adjustable" had to be made in the context of the invention, i.e., the specification. *Id.* at 1379–80. (By interpreting the word 'adjustable' as it did, the district court actually broadened the scope of the claim, i.e., it removed constraints on the limitation.).

The CAFC states that claims should be construed to preserve their validity. *Phillips III*, 415 F.3d at 1327.

III. PROPOSED—A STANDARD PROCESS FOR INTERPRETING CLAIMS

A. Addressing the uncertainty that remains following Phillips

Since *Phillips III* does not establish a predictable method for resolving claim interpretation disputes, an accused infringer still could not possibly determine, with any reasonable degree of certainty, how claims would be construed by the court, since it would not be apparent which evidence the court would rely on prior to trial and how it would be interpreted. Also, the Phillips III decision does not provide a standard (or specific steps) to be followed when using various sources of evidence for interpreting claim language. In effect, all that the court is asserting is that it would expect district courts to interpret patent claims using intrinsic evidence before relying on extrinsic evidence.⁵¹ It is still left up to the district courts, however, to attach the appropriate weight to the various sources of evidence in light of the statutes and policies of patent law.⁵² That is, the sequence of steps used by the trial judge in consulting sources is not important as long as those sources are not used to contradict meaning that is unambiguous in light of the intrinsic evidence.⁵³

This author proposes to reduce the uncertainty that remains following the Phillips III decision by recommending that specific steps be used in each case for interpreting claim language, i.e., for analyzing claim indefiniteness. These steps are intended to provide a predictable, standard process for resolving claim interpretation disputes and to help claims satisfy what the United States Supreme Court refers to as their definitional and public notice functions.⁵⁴

В. Recommended steps of the process

This proposed methodology should be used to interpret the meaning of a claim or of a term in a claim.⁵⁵ First, a claim or claim term must be interpreted

⁵¹ See id. at 1324.

⁵² Id

⁵³ Id.

See Hilton Davis Chem. Co. v. Warner-Jenkinson Co., 520 U.S. 17, 29 (1997).

A term in a claim can be ambiguous. Either the term is ambiguous on its face or the accused infringer may dispute the meaning of the term (which may appear to be clear on its face). Such a term simply has to be interpreted. The claim should not be rendered indefinite merely because it includes an ambiguous term. Of course, if the term can not be given a distinct meaning, the claim should be held to be indefinite and invalid. See Tennant Co. v. Hako Minuteman, Inc., 22 U.S.P.Q.2d (BNA) 1161, 1182 (N.D. III. 1991) (stating that "[a]mbiguity is not the same as indefiniteness, for while ambiguity refers to the possibility of

in accordance with the intrinsic evidence. This evidence should be examined first and, if an interpretation can be made, no further analysis will be undertaken. Second, if a claim term cannot be interpreted using the intrinsic evidence, then its meaning to one skilled in the art should be determined using a reference which was in existence at the time of patent issuance. Of course, the ordinary meaning of a claim term must make sense in the context of the intrinsic evidence. Third, if the claim still cannot be clearly construed, then expert testimony can be used, but only for limited purposes. Ultimately, if a claim meaning or term cannot be distinctly determined, then the claim must be held to be indefinite and, therefore, invalid. Each of these steps will be discussed *infra*.

1. Determine the meaning of the claim or any term in view of the intrinsic evidence

Claim definiteness analysis based on intrinsic evidence: In *In re Moore*, ⁵⁶ the Court of Customs and Patent Appeals (CCPA) said that "the definiteness of the [claim] language employed must be analyzed... in light of the teachings... of the particular application disclosure." As many as eighty-six subsequent court decisions (among them thirteen CAFC decisions and twenty-one CCPA decisions) cite this case when explaining how claim definiteness should be analyzed. In *Phillips III*, the CAFC reaffirmed the earlier decision in *Vitronics*, which indicated that claims should be read in view of the specification. ⁵⁸ In *Vitronics*, the CAFC said that a court's reliance on expert testimony as to "*proper construction* of a disputed claim term" is improper except in those rare instances where "the patent documents, taken as a whole, are insufficient to enable the court to construe disputed claim terms." Note that in *Vitronics*, the court considers "patent documents," i.e., the claims, ⁶⁰ the description of the in-

more than one distinct meaning, an indefinite statement may be one with *no* distinct meaning.") (emphasis added); *see also* Dentsply Int'l, Inc. v. Great White, Inc., 132 F. Supp. 2d 310, 314 (M.D. Pa. 2000) (stating that "the mere fact that the parties disagree on the meaning of the patent claims does not render those claims invalid under 35 U.S.C. § 112.").

⁵⁶ 439 F.2d 1232 (C.C.P.A. 1971).

⁵⁷ *Id.* at 1047.

⁵⁸ Phillips, 415 F.3d 1303; Vitronics Corp. v. Conceptronic, Inc., 90 F.3d 1576, 1583 (Fed. Cir. 1996).

⁵⁹ *Id.* at 1585.

Note that a claim preamble is regarded as limiting the scope of a claim if it recites essential structure that is important to the invention or necessary to give meaning to the claim. NTP, Inc. v. Research in Motion, Ltd., 418 F.3d 1282, 1305 (Fed. Cir. 2005). Moreover, "[w]hen limitations in the body of the claim rely upon and derive antecedent basis from the preamble,

vention, and the prosecution history, as intrinsic evidence. In addition, in Solomon v. Kimberly-Clark Corp., 61 the CAFC equated the analysis of the "regards" requirement⁶² with the "definiteness" requirement and noted that "[a]s for the 'definiteness' portion of section 112, paragraph 2, our precedent is well-settled that a court will typically limit its inquiry to the way one of skill in the art would interpret the claims in view of the written description portion of the specification."63 According to the CAFC, the test for definiteness is "whether one skilled in the art would understand the bounds of the claim when read in light of the specification."64 In On Demand Machine Corp. v. Ingram Industries, Inc.,65 the CAFC resolved the meaning of disputed claim terms by interpreting them in view of the intrinsic evidence. 66 In Personalized Media Communications, LLC. v. International Trade Commission, 67 the court agreed with the patent holder that the specification clearly apprises one of ordinary skill in the art of the scope of the [disputed] claim term. 68 The court went on to say that "[e]xtrinsic evidence may not be relied upon during claim construction when the intrinsic evidence unambiguously defines the disputed claim language."69

then the preamble may act as a necessary component of the claimed invention." Eaton Corp. v. Rockwell Int'l Corp., 323 F.3d 1332, 1339 (Fed. Cir. 2003). In *Bicon, Inc. v. Straumann Co.*, the patentee effectively attempted to read limitations out of its claim (to broaden the claim in order to read on the accused device) by ignoring the structural limitations recited in the preamble. 441 F.3d 945, 949–50 (Fed. Cir. 2006). According to the CAFC, doing so "would be contrary to the specification," i.e., the description of the invention. *Id.* at 951. The court did not agree that the structure the patent holder considered to be superfluous to its claim was, indeed, unnecessary in view of its understanding of the invention. *Id.* at 952.

^{61 216} F.3d 1372 (Fed. Cir. 2000).

^{62 &}quot;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." 35 U.S.C. § 112, para. 2 (emphasis added).

⁶³ Solomon, 216 F.3d at 1378.

Id. (quoting Personalized Media Commc'ns, LLC v. Int'l Trade Comm'n, 161 F.3d 696, 705 (Fed. Cir. 1998)).

^{65 442} F.3d 1331 (Fed. Cir. 2006).

⁶⁶ *Id.* at 1337.

^{67 161} F.3d 696 (Fed. Cir. 1998).

⁶⁸ *Id.* at 705.

⁶⁹ Id. at 706. Note that the International Trade Commission confused the notion of enablement with the requirement of claim term definiteness.

2. Determine the term's ordinary meaning using specifically defined extrinsic evidence that one of ordinary skill in the art would use at the time of patent issuance

Only if the meaning of a claim or the terms therein is not determinable by a review of the intrinsic evidence should the term's ordinary meaning to one skilled in the art be determined using specifically defined extrinsic evidence. This extrinsic evidence should be a reference in existence at the time of patent issuance that one of ordinary skill would use.⁷⁰ The meaning of the term derived from the extrinsic evidence must make sense in the context of the intrinsic evidence.

In determining ordinary meaning, in *Vitronics*, the CAFC said that "[e]ven in those rare instances . . . dictionaries . . . are more objective and reliable guides [than expert testimony]." In particular, the court said that "dictionary definitions, although extrinsic, may be used to establish a claim term's ordinary meaning." The court in *Phillips III* indicated that a general-purpose dictionary might be helpful to assist in the understanding of the commonly understood meaning of words. Numerous court decisions recite that patent claim terms must be given their "accustomed," "ordinary," or dictionary meaning unless the specification provides another meaning. All that is required is that the patent applicant set out the different meaning in the specification in a manner sufficient to give one of ordinary skill in the art notice of the change from the ordinary meaning.

a. The time at which ordinary meaning is determined

In SmithKline Beecham Corp. v. Apotex Corp., 74 the CAFC said that "[c]laim interpretation requires the court to ascertain the meaning of the claim to

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A claim term meaning is to be interpreted in view of the intrinsic evidence, which is not fully established until the claim issues. If it were necessary to resort to extrinsic evidence to interpret the ordinary meaning of a claim term, then the interpretation should be made based on such evidence which is in existence at the time of patent issuance since the ordinary meaning must make sense in the context of the intrinsic evidence.

⁷¹ Vitronics Corp. v. Conceptronic, Inc., 90 F.3d 1576, 1585 (Fed. Cir. 1996).

Lacks Indus., Inc. v. McKechnie Vehicle Components USA, Inc., 322 F.3d 1335, 1342 (Fed. Cir. 2003) (citing *Vitronics*, 90 F.3d at 1584 n.6).

⁷³ Phillips v. AWH Corp., 415 F.3d 1303, 1314 (Fed. Cir. 2005).

⁷⁴ 403 F.3d 1331 (Fed. Cir. 2005).

one of ordinary skill in the art at the time of invention."⁷⁵ The CAFC recognized in Chiron Corp. v. Genentech, Inc.76, however, that "the meaning of 'monoclonal antibody' may not have been stagnant between the earlier applications and the [issuance of the] patent," and that it faced a dilemma (which it did not have to resolve) as to what time frame should be referenced in construing the claim terms.⁷⁷ Several lower court decisions have said that claims must be interpreted as by one of ordinary skill in the art at the time the patent issues.⁷⁸

b. Determine ordinary meaning in the context of what the patentee regards as his invention at the time of patent issuance

In 3M Innovative Properties Co. v. Avery Dennison Corp.,79 the CAFC said that "[a] term's ordinary meaning . . . must be considered in the context of all intrinsic evidence, namely the claims, the specification, and the prosecution history."80

3. Limited use of expert testimony

If the term and claim meaning are still not clearly defined, first by intrinsic evidence and then by use of a reference as explained in step 2, expert testimony can be used, but only to a limited extent. Expert testimony can be used to help understand the underlying technology that would clarify the meaning. Expert testimony can also be used to explain why the definition of a term obtained from a particular reference is the only reasonable way the term can be defined, when considered in the context of the intrinsic evidence, in view of conflicting definitions in other references. These reasons should be the extent to which expert testimony is used. Expert testimony should not be used to define the meaning of a claim term if the meaning of the term cannot be defined by steps 1 and 2, as discussed supra.

76 363 F.3d 1247 (Fed. Cir. 2004).

Id. at 1338.

⁷⁷ Id. at 1257–58.

See, e.g., In re Indep. Serv. Orgs. Antitrust Litig., 114 F. Supp. 2d 1070, 1102 (D. Kan.

³⁵⁰ F.3d 1365 (Fed. Cir. 2003).

Id. at 1371.

a. Reasons why reliance on expert testimony would generally not be proper to determine claim scope

In Southwall Technologies, Inc. v. Cardinal IG Co., 81 the court said that to use expert testimony "would be unfair to competitors who must be able to rely on the patent documents themselves, without consideration of expert opinion that then does not even exist, in ascertaining the scope of a patentee's right to exclude."82 In Bell & Howell Document Management Products Co. v. Altek Systems, 83 the court said that "[p]atents should be interpreted on the basis of their intrinsic record, not on the testimony of such after-the-fact 'experts' that played no part in the creation and prosecution of the patent."84

b. Instances when reliance on expert testimony is proper

In *Markman v. Westview Instruments, Inc.*,⁸⁵ the court indicated that expert testimony should be limited to aiding the court in understanding the technology.⁸⁶ *Markman* effectively limits reliance on expert testimony to testimony in explanation of the technology and technical terms. In *Cybor Corp. v. FAS Technologies, Inc.*,⁸⁷ the CAFC reaffirmed that extrinsic evidence including expert testimony is not to be relied upon for purposes of claim interpretation, other than to aid the judge in understanding the technology.⁸⁸ "[S]uch evidence [is only] an aid to the court in coming to a correct conclusion as to the true meaning of the language employed in the patent."⁸⁹ In *Altiris, Inc. v. Symantec Corp.*,⁹⁰ the court indicated that the expert testimony established that it was "technologically possible" to achieve the invention's purpose without performing the steps in the order disclosed in the patent's preferred embodiment.⁹¹ The court stated that "[i]n this regard, the expert testimony serves the permissible purposes of

⁵⁴ F.3d 1570 (Fed. Cir. 1995).

⁸² *Id.* at 1578.

⁸³ 132 F.3d 701 (Fed. Cir. 1997).

⁸⁴ *Id.* at 706.

⁸⁵ 517 U.S. 370 (1996).

⁸⁶ *Id.* at 387.

⁸⁷ 138 F.3d 1448 (Fed. Cir. 1998) (en banc).

⁸⁸ *Id.* at 1455, n.5.

⁸⁹ Id.

⁹⁰ 318 F.3d 1363 (Fed. Cir. 2003).

⁹¹ *Id.* at 1371.

aiding our understanding of the technology and in helping us view the patent through the eyes of the skilled artisan."92

c. Instances when reliance on expert testimony would not be proper when interpreting claims

In Goldenberg v. Cytogen, Inc.,93 the CAFC said that "expert testimony and declarations . . . cannot be used to vary the plain language of the patent document."94 In In re Hammack, 95 the CCPA said that if claims required "elaborate explanations extraneous to both the specification and the claims" they were not drafted with a reasonable degree of particularity. 96 That is, the claims cannot be properly interpreted and are, therefore, invalid.

d. A claim is indefinite and invalid if a claim term cannot be defined by step 1 and step 2

In Arcade Inc. v. Minnesota Mining & Manufacturing Co., 97 the court indicated that when the patent (description) never refers to a term used by the inventor to describe his invention (in the claim), the claim is hereby rendered indefinite and invalid.98 According to court in Georgia Pacific Corp. v. United States Plywood Corp., "[i]f the subject matter of the patent is such that the patentee cannot verbalize his invention comprehensibly or is incapable of ascribing reasonable limits to his claims, regardless of intrinsic merit his invention cannot be patented" because the claims are indefinite. 99

4. Competing Interpretations

If, after applying each of the foregoing steps, a term meaning or claim meaning has several reasonable and distinct interpretations, i.e., one interpretation is narrower than another, and there is no clear evidentiary basis for select-

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³⁷³ F.3d 1158 (Fed. Cir. 2004).

Id. at 1166.

⁴²⁷ F.2d 1378 (C.C.P.A. 1970).

Id. at 1381.

²⁴ U.S.P.Q.2d (BNA) 1578 (E.D. Tenn. 1991), aff'd, 1 F.3d 1253 (Fed. Cir. 1993).

Id. at 1587.

²⁵⁸ F.2d 124, 136 (2d Cir. 1958). See also United Carbon Co. v. Binney Co., 317 U.S. 228 (1942).

ing one, the term or claim should be interpreted using the narrower meaning. This may be done as long as it is consistent with the description of the invention provided in the specification. A narrow meaning, however, should not be chosen solely to preserve the claim's validity over the prior art or to make it operable.

The following cases suggest that when a claim term can reasonably be given two meanings and neither the specification nor the prosecution history provides a clear basis for selecting one, a court should adopt the narrower one, which tends to show noninfringement, on the ground that the patentee is ultimately responsible for the drafting of the claim language.

a. Selecting the narrower of two reasonable interpretations¹⁰⁰

In Athletic Alternatives, Inc. v. Prince Manufacturing, Inc., 101 the CAFC cited the § 112 definiteness standard to support adopting the narrower of two clear and distinct interpretations. 102 The court also said that "[a]s courts have recognized since the requirement [i.e., the definiteness standard] that one's invention be distinctly claimed became part of the patent law in 1870 . . . the primary purpose of the requirement is 'to guard against unreasonable advantages to the patentee and disadvantages to others arising from uncertainty as to their [respective] rights." 103 In addition, in McClain v. Ortmayer, 104 the United States Supreme Court said that "[t]he object of the patent law in requiring the patentee [to distinctly claim his invention] is not only to secure to him all to which he is entitled, but to apprise the public of what is still open to them." 105 In Hoganas AB v. Dresser Industries, Inc., 106 the CAFC said that the function of claims is "putting competitors on notice of the scope of the claimed invention." 116 The court was, in effect, recognizing the patentee's drafting burden. The Athletic Alternatives court concluded that "[w]here there is an equal choice between a

Note that the cases do not require a court to choose a narrow definition of a claim limitation whenever there is a dispute over meaning and ambiguity. Only when the patentee provides two clear yet contradictory definitions would the court choose the narrower of the two.

¹⁰¹ 73 F.3d 1573 (Fed. Cir. 1996).

¹⁰² *Id.* at 1581.

¹⁰³ *Id*.

¹⁰⁴ 141 U.S. 419 (1891).

¹⁰⁵ *Id.* at 424.

¹⁰⁶ 9 F.3d 948 (Fed. Cir. 1993).

¹⁰⁷ *Id.* at 951.

broader and a narrower meaning of a claim, and there is an enabling disclosure that indicates that the applicant is at least entitled to a claim having the narrower meaning, we consider the notice function of the claim to be best served by adopting the narrower meaning."¹⁰⁸

b. Construing claims against the drafter by selecting the narrower claim (term) interpretation

In *Hoganas*, the court said that

[i]f [the inventor's assignee], who was responsible for drafting and prosecuting the patent, intended something different [from the ordinary meaning of the claim term], it could have prevented this result through clearer drafting.... It would not be appropriate for us now to interpret the claim differently just to cure a drafting error.... 109

In *Ethicon Endo-Surgery, Inc. v. United States Surgical Corp.*, ¹¹⁰ the patentee said that the claim extended to a structure beyond that which was unambiguously described in the intrinsic evidence. ¹¹¹ The court held "that to the extent that the claim is ambiguous, a narrow reading which excludes the ambiguously covered subject matter must be adopted." ¹¹² In *Rackman v. Microsoft Corp.*, ¹¹³ the court relied on a treatise that said, "[t]o the extent that a broad reading of a claim renders it ambiguous, the claim should be construed against the patentee and given a narrow construction." ¹¹⁴ In *Depuy Orthopaedics, Inc. v. Androphy*, ¹¹⁵ the courts said that "[w]hen two or more equally plausible definitions exist for a disputed term in a patent claim, then the court should adopt the narrower interpretation because the claim provides objective and reasonable notice to the public of the exclusionary rights granted to [the] patentee." ¹¹⁶

¹⁰⁸ Athletic Alternatives, 73 F.3d at 1581.

¹⁰⁹ *Hoganas*, 9 F.3d at 951.

¹¹⁰ 93 F.3d 1572 (Fed. Cir. 1996).

¹¹¹ *Id.* at 1579.

¹¹² *Id.* at 1581.

^{113 102} F. Supp. 2d 113 (E.D.N.Y. 2000).

¹¹⁴ Id at 122

¹¹⁵ 53 U.S.P.Q.2d (BNA) 1941 (N.D. III. 2000).

¹¹⁶ *Id.* at 1948.

c. Preserving validity

In *Allen Engineering Corp. v. Bartell Industries, Inc.*,¹¹⁷ the CAFC said that "[i]t is not our function to rewrite claims to preserve their validity. We are simply tasked with determining whether the claims 'particularly point[] out and distinctly claim[]' what the inventor regards as his invention." In *Rhine v. Casio, Inc.*,¹¹⁹ the CAFC stressed that "if the only claim construction that is consistent with the claim's language and the written description renders the claim invalid, then the axiom [that claims should be construed, if possible, to sustain their validity] does not apply and the claim is simply invalid." ¹²⁰

5. If a term meaning or claim meaning is not distinctly determined following application of steps 1, 2, 3 and 4, the claim must be held to be indefinite and, therefore, invalid

The CAFC has indicated that when the meaning of a claim is in doubt, it is proper to declare the claim invalid.¹²¹ In his presentation to the 2006 FICPI World Congress in Paris, France, Chief Judge Paul Michel said that "[i]n 18 years on the Federal Circuit, I can barely remember any claims being invalidated for indefiniteness. Yet, the broader claims of many otherwise valid patents look indefinite to me."¹²² In essence, he is encouraging courts to construe claims from a claim indefiniteness analysis perspective to ensure that claims do not fail to fairly warn others.

¹¹⁷ 299 F.3d 1336 (Fed. Cir. 1999).

¹¹⁸ *Id.* at 1349 (citation omitted).

¹¹⁹ 183 F.3d 1342 (Fed. Cir. 1999).

¹²⁰ Id. at 1345. See also Chef America, Inc. v. Lamb-Weston, Inc., 358 F.3d 1371, 1374 (Fed. Cir. 2004) (stating that "[t]his court... repeatedly and consistently has recognized that courts may not redraft claims, whether to make them operable or to sustain their validity.").

See, e.g., Amgen, Inc. v. Chugai Pharm. Co., 927 F.2d 1200, 1218 (Fed. Cir. 1991); Standard Oil Co. v. American Cyanamid Co., 774 F.2d 448, 453 (Fed. Cir. 1985).

Hon. Paul R. Michel, Chief Judge, CAFC, Plenary Address to the 2006 FICPI World Congress, Optimizing the Balance between Patentees and Rivals, (May 23, 2006), available at http://ficpi.org/library/PARIScongress/3-Michel (revisedFinal).pdf.

IV. INTERPRETING THE LANGUAGE OF A SPECIFIC CLAIM USING THE STEPS OF THE PROCESS

Illustration of the proposed methodology: Assume that a court has conducted a claim construction proceeding following the filing of a patent infringement suit by a patent owner (plaintiff, an orthopaedic surgeon) against an orthopaedic products company (defendant). 123 The claims of the plaintiff's patent generally pertain to a set of instruments that guide a surgeon in removing portions of the bones around a patient's knee in order to permit the proper installation of an artificial knee. In particular, the patent contains the following claim:

- 1. In a system for making triplanar bone resections for total knee replacement, the system including a set of instruments for resecting the anterior and posterior femoral condyles [rounded protuberances at the end of the bones], the proximal tibia [bone between knee and ankle], and the distal femur [thigh bone], the resections being made to provide equal flexion and extension gaps, the improvement comprising a simplified set of instruments, including:
 - an L-shaped guide rod having a first elongated portion adapted to be inserted into the medullary canal [marrow cavity of bone] of the femur and a second portion disposed at a right angle to the first portion; and
 - a guide member having a planar slot therein, said member being adapted to be mounted on the second portion of said guide rod with said slot being parallel to the second portion and disposed relative to the first portion at a minor angle equal to 90° minus the valgus angle [a term denoting position, meaning bent outward or twisted].

During the claim construction proceeding, the court applied the steps of the proposed process, as outlined in Section III.B. infra.

The defendant interpreted the "L-shaped guide rod" (in the first clause of claim 1) as being entirely round. The court concluded that the defendant's interpretation was not accurate. Focusing on the intrinsic evidence in accordance with the first step of the process, the court observed that the specification describes the L-shaped guide rod as having a threaded portion possessing a flat portion along the side thereof. The flat portion contained measurement marks to indicate the thickness of the components of the tibia. The patent specification depicts a rod that is substantially round, but that also (of necessity) possesses a flat segment on the second portion of the guide rod for measurement purposes. Therefore, the court concluded that the defendant's proposed interpretation of

This illustration is based on Depuy Orthopaedics Inc. v. Androphy, 53 U.S.P.Q.2d (BNA) 1941 (N.D. Ill. 2000).

the "L-shaped guide rod" as being a "round bar" was not the interpretation that would be reached by one skilled in the art in view of the specification.

The defendant then asserted that the term "rod" actually meant "bar." The court said that since the term "rod" could not be determined by a review of the intrinsic evidence in accordance with the first step of the proposed process, e.g., it was not defined by the patentee, the term should be given its ordinary meaning in accordance with the second step of the proposed interpretation process. The court observed that the term "rod" is a common word possessing ordinary meaning that can be determined using a reference that one of ordinary skill in the art would use at the time of patent issuance (which is when the intrinsic evidence would be complete). The court concluded that the ordinary meaning of the word "rod" did not include the word "bar." The court also took into account the claim language to determine the literal scope of the disputed term "rod," i.e., to see if it would make sense to interpret it to mean "bar" in the context of the intrinsic evidence. The court noted that other components of the system were specifically identified as "bars" in the claims (as well as in the description of the invention) so that the patentee intentionally made a distinction between "rods" and "bars."

Instead of having a single ordinary meaning, assume that two references, both of which could be expected to be relied upon by one skilled in the art at the time of patent issuance, provided conflicting definitions of the word "rod." The court could then utilize expert testimony in accordance with step 1c of the process, but only for the purpose of explaining why the definition of the word "rod" provided by one reference is the only reasonable way the term could be defined, when considered in the context of the intrinsic evidence. Expert testimony could not be utilized merely to define the meaning of the term "rod."

The claim is unclear as to whether or not the "L-shaped rod" is a single piece rod with two portions when inserted into the femur (as asserted by the defendant) or a multiple piece rod that forms the "L" shape when the guide member attaches to the rod (as argued by the plaintiff). Since there is no clear evidentiary basis for selecting one interpretation over the other, the narrower meaning, i.e., that the L-shaped rod is a single piece with two portions, is selected in accordance with the second step of the process. This interpretation, even though it may mean that the defendant does not infringe the claim, appears to be consistent with the description of the L-shaped rod in the specification.

If the narrower interpretation of the "L-shaped rod," even though reasonable, was inconsistent with the description of the invention of the process (and there was no clear evidentiary basis for selecting the broader interpretation) or if the meaning of the term "rod" could not be distinctly determined, the claim would be held to be indefinite and, therefore, invalid in accordance with the final step of the process.

If all courts would apply this standard process to all instances in which claims are interpreted, it would help make it easier to discern what activities will likely infringe a patent prior to trial, as it will be apparent which evidence the court will rely on prior to trial. That is, there will be a greater degree of certainty as to how claims will be construed. Furthermore, the process of claim interpretation would be consistent and predictable at both the trial court and appellate court levels.

V. **CONCLUSION**

The primary purpose of the statutory requirement of "definiteness" in claims is to provide clear warning to the public as to what constitutes infringement of the claim. Without such warning, one reasonably skilled in the art would have to wait to be accused of infringement of the claim before determining whether or not his activities would likely infringe the patent. That is, one skilled in the art would have to wait for a court to interpret the claim, using whatever evidence the court decided would be helpful to determine the meaning of the claim. Despite attempts in recent years to eliminate the confusion regarding the types of evidence courts should rely on to interpret claims (and the order in which such evidence should be considered), the process of claim interpretation still has not been consistent or predictable at either the trial court or the appellate court level. What is needed is a standard, predictable method for interpreting claims during trial as well as a method for making it easier to discern what activities will likely infringe a patent prior to trial. The process proposed by this author (and summarized *infra*) satisfies both needs.

Summary of the process for interpreting claim language (for analyzing claim indefiniteness):

- 1) A claim must be interpreted in accordance with the intrinsic evidence. This evidence is to be examined first and, if an interpretation can be made, no further analysis will be undertaken.
- 2) If the claim cannot be interpreted using the intrinsic evidence, then its meaning to one skilled in the art should be determined using one or more references which are in existence at the time of patent issuance. (Note that the ordinary meaning of a claim term must make sense in the context of the intrinsic evidence, which is not settled until the patent issues.)
- 3) If the claim still cannot be clearly construed, then expert testimony could be used, but only for limited purposes.

If, when the analysis is complete, a claim still has several reasonable interpretations, e.g., one narrower than the other, then the narrower interpretation should be chosen (with one exception) provided that it is consistent with the intrinsic evidence. If the claim cannot be narrowly interpreted, the claim must be held to be indefinite and, therefore, invalid.