

UNITED STATES DISTRICT COURT
DISTRICT OF CONNECTICUT

OLEG SOKOLOV,
Plaintiff,
V.
LORAD CORP., HOLOGIC, INC.,
Defendants.

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: CASE NO. 3:04-CV-1903 (RNC)
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RULING AND ORDER

Plaintiff holds the right to U.S. Patent No. 5,970,118 (the '118 patent), which claims an improved cellular x-ray grid. Plaintiff alleges that defendant Hologic, Inc., which owns the assets of plaintiff's former employer, is infringing his patent. Defendant has moved for summary judgment, arguing that the '118 patent is indefinite under 35 U.S.C. § 112, ¶¶ 2 and 6 because it fails to disclose any structure corresponding to a means-plus-function limitation in the claim. I find, by clear and convincing evidence, that the claim contains a means-plus-function limitation and that the specification does not disclose any corresponding structure. Because this failure to disclose corresponding structure renders the '118 patent invalid, I grant the motion for summary judgment and dismiss the case.

I. Background

The plaintiff filed the original patent application directed to this invention in 1993. He filed two continuation

applications in 1995 and 1996, the latter of which issued as the '118 patent on October 19, 1999. The '118 patent claims a cellular x-ray grid. The plaintiff's grid is said to be superior to previous grids in that it achieves "a complete erasing of the image of the cells during its movement over the time of X-ray examinations." (Col. 1, lns. 59-61.)

The patent application was rejected on obviousness and indefiniteness grounds several times during its prosecution. In 1998, the examiner rejected the patent because, among other reasons, "no means for moving the grid [were] recited." (Pl.'s Ex. A.50 at 2.) In response to the examiner's concerns, the plaintiff amended the claim to include the language "and means for moving of said grid in said direction during an x-ray exposure procedure." (Pl.'s Ex. A.53.) He explained in his accompanying comments that "all contemporary X-ray machines in the world for conventional medical x-ray technology are supplied by Bucky mechanisms for movement of grids in which using grids have been installed." (Pl.'s Ex. A.53.) Following this amendment and others, the examiner issued a notice of allowance in March 1999.

At the time plaintiff originally applied for the patent, he was employed by Lorad Corp. Hologic, Inc. acquired Lorad Corp.'s business assets in 2000. In November 2004, plaintiff initiated this lawsuit against Hologic, Inc. and Lorad Corp. alleging that

Hologic is making and/or selling cellular x-ray grids that infringe the '118 patent.¹

II. Discussion

Defendant contends that the final phrase of claim 1 - "means for moving of said grid in said direction during an x-ray exposure procedure" - is recited as a means-plus-function limitation, see 35 U.S.C. § 112, ¶ 6, and that the specification does not disclose a corresponding structure, rendering the patent invalid for indefiniteness. Indefiniteness "is a legal conclusion that is drawn from the court's performance of its duty as the construer of patent claims." Default Proof Credit Card Sys., Inc. v. Home Depot, U.S.A., Inc., 412 F.3d 1291, 1298 (Fed. Cir. 2005) (quoting Atmel Corp. v. Info. Storage Devices, Inc., 198 F.3d 1374, 1378 (Fed. Cir. 1999)). Because patents are presumed valid, the party challenging a patent's validity must prove the facts supporting indefiniteness by clear and convincing evidence. See Default Proof Credit Card Sys., Inc., 412 F.3d at 1297.

Title 35, section 112, paragraph 6 of the United States Code provides:

An element in a claim for a combination may be expressed as a means or step for performing a specified function without the recital of structure, material, or acts in support thereof, and such claim shall be

¹ According to defendant, Lorad Corp. is no longer a separate entity.

construed to cover the corresponding structure, material, or acts described in the specification and equivalents thereof.

This provision "was intended to allow 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." Med. Instrumentation & Diagnostics Corp. v. Elekta AB, 344 F.3d 1205, 1211 (Fed. Cir. 2003). Claims expressed pursuant to § 112, ¶ 6 are known as means-plus-function or step-plus-function elements. To satisfy § 112, ¶ 6, an applicant using means-plus-function format must disclose the corresponding structure in the specification. See id. "This duty to link or associate structure to function is the quid pro quo for the convenience of employing § 112, ¶ 6." Default Proof Credit Card Sys., Inc., 412 F.3d at 1298. Failure to disclose the corresponding structure renders the patent invalid for failure to satisfy the definiteness requirement of § 112, ¶ 2.² Cardiac Pacemakers, Inc. v. St. Jude Med., Inc., 296 F.3d 1106, 1114 (Fed. Cir. 2002).

The threshold issue facing the court is whether the disputed language is intended to convey a means-plus-function limitation. The use of the word "means" in combination with a function gives

² Title 35, section 112, paragraph 2 of the United States Code provides: "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."

rise to a presumption that the claim element is a means-plus-function limitation. Al-Site Corp. v. VSI Int'l, Inc., 174 F.3d 1308, 1318 (Fed. Cir. 1999). However, this presumption can be overcome if the claim itself recites sufficient structure for performing the function. Id.; see, e.g., Cole v. Kimberly-Clark Corp., 102 F.3d 524, 531 (Fed. Cir. 1996) (holding that "perforation means . . . for tearing" recited sufficient structure because the claim identified the structure (*i.e.*, perforation) and its location and extent). "The recitation of some structure in a means plus function element" does not overcome this presumption when the structure "tells only what the means-for-[function] *does*, not what it *is* structurally." Laitram Corp. v. Rexnord, Inc., 939 F.2d 1533, 1536 (Fed. Cir. 1991).

Plaintiff contends that the disputed claim language does not describe a means-plus-function element, notwithstanding the words "means for," because it recites structure by which to move the grid. Plaintiff argues that a reader skilled in the art would construe "during an x-ray exposure procedure" in light of the specification and prosecution history as reciting structure for moving a grid. In particular, plaintiff points to the prosecution history's disclosure of the Bucky mechanism as the conventional mechanism for moving grids and to the specification's citation of an article and patent that disclosed means for moving grids.

When viewed in light of the presumption of means-plus-function format, the phrase "during an x-ray exposure procedure" cannot be construed to recite structure by which to move the grid. On its face, "during an x-ray exposure procedure" does not recite any structure for moving a grid. An "x-ray" or "x-ray exposure procedure" cannot move a grid. This language merely explains the context in which the means moves the grid. In other words, it reveals more about what the means for moving the grid "does, not what it *is* structurally." Laitram Corp., 939 F.2d at 1536.

Plaintiff would have the court go beyond the plain language of the claim to construe "during an x-ray exposure procedure" to recite structure in light of the prosecution history and current knowledge among those trained in the art. But, in deciding whether the presumption of means-plus-function format is overcome, the inquiry must focus on whether "the claim *itself* recites sufficient structure or material for performing the claimed function." Al-Site Corp., 174 F.3d at 1318 (emphasis added); see also Sage Prods., Inc. v. Devon Indus., Inc., 126 F.3d 1420, 1427-28 (Fed. Cir. 1997) ("[W]here a claim recites a function, but then goes on to elaborate sufficient structure, material, or acts *within the claim itself* to perform entirely the recited function, the claim is not in means-plus-function format." (emphasis added)). Plaintiff has not cited, nor has the

court located, any case in which the Federal Circuit construed nonstructural language to find structure in the way suggested by plaintiff. In every case cited by the plaintiff in which the means-plus-function presumption was overcome, the relevant structure appeared in the claim. See Cole, 102 F.3d at 531 (“perforation means”); MediaCom Corp. v. Rates Tech., Inc., 4 F. Supp. 2d 17, 27 (D. Mass. 1998) (“switch means”).³

In arguing that “during an x-ray exposure procedure” recites sufficient structure to circumvent a means-plus-function construction, plaintiff is essentially asking the court to ignore the presumption of means-plus-function format and construe the element as any other claim term. Plaintiff’s proposed construction would allow him the convenience of drafting his claim as a means-plus-function limitation while avoiding the corresponding strictures of § 112, ¶ 6. See O.I. Corp. v. Tekmar

³ Plaintiff cites Cole for the proposition that means-plus-function elements should be construed pursuant to ordinary principles of claim construction. In Cole, the Federal Circuit construed “perforation” as it would have been understood by a reader skilled in the art and concluded that the term described “structure supporting the tearing function.” 102 F.3d at 531. In other cases, the court applied ordinary principles of claim construction to determine whether a claim lacked sufficient structure, thereby invoking § 112, ¶ 6, even though the claim did not use the term “means.” See, e.g., Personalized Media Commc’ns, L.L.C. v. Int’l Trade Comm’n, 161 F.3d 696, 704-05 (Fed. Cir. 1998) (finding that the term “digital detector” conveyed a structure to those knowledgeable in the art). None of these cases suggests that ordinary principles of claim construction may be used to construe the term “means” to connote structure that does not appear in the claim.

Corp., 115 F.3d 1576, 1583 (Fed. Cir. 1997) (“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.”). Plaintiff cannot invoke the prosecution history and current knowledge to relieve himself of the statutory burdens of § 112, ¶ 6. Because the claim does not itself recite any structure by which to move the grid, I must construe this element as a means-plus-function element.

Construction of a means-plus-function element proceeds in two steps. The first step is to identify the claimed function. Cardiac Pacemakers, Inc., 296 F.3d at 1113. “Ordinary principles of claim construction govern interpretation of the claim language used to describe the function.” Id. The claimed function is “moving of said grid in said direction during an x-ray exposure procedure.”

The second step is to identify the structure disclosed in the specification that corresponds to the claimed function. Id. “A structure disclosed in the specification qualifies as ‘corresponding’ structure only if the specification or prosecution history clearly links or associates that structure to the function recited in the claim.” Default Proof Credit Card Sys., Inc., 412 F.3d at 1298.

Careful review of the specification reveals no mention of any structure for moving the grid. Plaintiff cites the following

passage as evidence of structure: "Without further analysis, the foregoing will so fully reveal the gist of the present invention that others can, by applying current knowledge, readily adapt it for various applications" (Col. 4, lns. 3-5.) Plaintiff contends that this passage, in conjunction with the reference to the Bucky mechanism in the prosecution history, adequately discloses the structure because the Bucky mechanism is the conventional mechanism for moving grids during an x-ray exposure procedure.

This vague reference to "current knowledge" does not satisfy the requirements of § 112, ¶ 6. The structure corresponding to a means-plus-function element must be disclosed in the specification. Default Proof Credit Card Sys., Inc., 412 F.3d at 1302. Although the prosecution history may link the disclosed structure to the recited function, see Med. Instrumentation & Diagnostics Corp., 344 F.3d at 1219, it is the specification that must disclose the structure, see id. at 1218. Likewise, "while it is true that the patentee need not disclose details of structures well known in the art, the specification must nonetheless disclose some structure." Default Proof Credit Card Sys., Inc., 412 F.3d at 1302 (citation omitted); see also Med. Instrumentation & Diagnostics Corp., 344 F.3d at 1212 ("It is not proper to look to the knowledge of one skilled in the art apart from and unconnected to the disclosure of the patent."). Put

simply, the fact that the Bucky mechanism was well-known in the field and disclosed in the prosecution history does not compensate for plaintiff's total failure to disclose *any* structure in the specification.

Plaintiff's remaining arguments are unavailing. He remarks that a mechanism for moving a cellular x-ray grid was disclosed in an article by Mattson and in the Caldwell patent, both of which are cited in the specification. But, even if these sources are deemed incorporated by reference, the Federal Circuit has held that "material incorporated by reference cannot provide the corresponding structure necessary to satisfy the definiteness requirement for a means-plus-function clause." Default Proof Credit Card Sys., Inc., 412 F.3d at 1301.

Plaintiff also suggests that the representation of the direction of the grid's movement in Figure 1 of the specification suffices under § 112, ¶ 6 because it discloses an "act." The Federal Circuit has foreclosed this argument as well. See O.I. Corp., 115 F.3d at 1582-83 (interpreting "structure" and "materials" as corresponding to means-plus-function limitations and "acts" as corresponding to step-plus-function limitations). The arrow showing the direction of movement in Figure 1 in no way discloses any structure by which to move the grid.

Given the complete absence of any corresponding structure in the specification, the evidence that the '118 patent is invalid

under § 112, ¶ 2 is clear and convincing. This outcome may be harsh. But in opting for the convenience of drafting his claim in means-plus-function format, the plaintiff undertook to comply with the requirements of § 112, ¶ 6.⁴ Section 112 aims "to ensure that the claims are written in such a way that they give notice to the public of the extent of the legal protection afforded by the patent." Default Proof Credit Card Sys., Inc., 412 F.3d at 1303-04. By failing to disclose a corresponding structure for moving the grid, the patent does not give the public adequate notice of the scope of its protection.

III. Conclusion

For the foregoing reasons, defendant's motion for summary judgment [Doc. #67] is hereby granted. Judgment shall enter for defendants, and the complaint is dismissed with prejudice.

So ordered.

Dated at Hartford, Connecticut this 2nd day of March 2007.

/s/
Robert N. Chatigny
United States District Judge

⁴ I recognize that the plaintiff inserted the means-plus-function language in response to the examiner's concerns. The examiner's issuance of the patent after plaintiff's amendment gives rise to a presumption of validity, rebuttable by clear and convincing evidence. See Cardiac Pacemakers, Inc., 296 F.3d at 1114. It does not, however, preclude a finding of invalidity, as plaintiff seems to suggest. Nor do the examiner's comments imply that he understood "during an x-ray exposure procedure" to recite structure.