

United States Court of Appeals
for the Federal Circuit

TYPHOON TOUCH TECHNOLOGIES, INC.,
Plaintiff-Appellant,

v.

DELL, INC. AND LENOVO (UNITED STATES), INC.,
Defendants-Appellees,

and

SAND DUNE VENTURES, INC.,
Defendant-Appellee,

and

**TOSHIBA AMERICA INFORMATION SYSTEMS,
INC.,**
Defendant-Appellee,

and

**FUJITSU AMERICA, INC.
(FORMERLY KNOWN AS FUJITSU COMPUTER SYSTEMS
CORPORATION),**
Defendant-Appellee,

and

**PANASONIC CORPORATION OF NORTH
AMERICA,**
Defendant-Appellee,

and

APPLE, INC.,

Defendant,

and

HTC AMERICA, INC.,
Defendant-Appellee,

and

PALM, INC.,
Defendant-Appellee.

2009-1589

Appeal from the United States District Court for the Eastern District of Texas in Case No. 07-CV-0546, Judge Leonard Davis.

Decided: November 4, 2011

CHARLES R. WOLFE, JR., Blank Rome LLP, of Washington, DC, argued for plaintiff-appellant. With him on the brief were PAUL M. HONIGBERG, BRIAN WM. HIGGINS and JACK L. HOBAUGH, JR. Of counsel was H. KEETO SABHARWAL.

EDWARD R. REINES, Weil, Gotshal & Manges LLP of Redwood Shores, California, and JOSEPH R. RE, Knobbe, Martens, Olson & Bear LLP, of Irvine, California, argued for all defendants-appellees. On the brief for defendants-appellees Dell Inc. and Lenovo (United States), Inc. were HAROLD H. DAVIS, JR., K&L Gates LLP, of San Francisco, California, and RODERICK B. WILLIAMS, of Austin, Texas. On

the brief for defendant-appellee Toshiba America Information Systems, Inc., were IRFAN A. LATEEF, JON W. GURKA and AHSAN G. IMAM, Knobbe, Martens, Olson & Bear LLP, of Irvine, California. On the brief for defendant-appellee Fujitsu America, Inc., were BARTON E. SHOWALTER, DOUGLAS M. KUBEHL and DAVID O. TAYLOR, Baker Botts LLP, of Dallas, Texas. On the brief for defendant-appellee Panasonic Corporation of North America were DANIEL S. EBENSTEIN, JOSEPH M. CASINO, ABRAHAM KASDAN and DAVID A. BOAG, Amster Rothstein & Ebenstein LLP, of New York, New York. Of counsel was MARC JASON. On the brief for defendant-appellee Apple Inc., was JESSICA L. DAVIS, Weil, Gotshal & Manges LLP of Redwood Shores, California, and DANNY L. WILLIAMS, Williams, Morgan & Amerson, P.C., of Houston, Texas. Of counsel was ERIC M. ALBRITTON, Albritton Law Firm, of Longview, Texas. On the brief for defendant-appellee HTC America, Inc. were JONATHAN M. JAMES, DAN L. BAGATELL and DAVID J. PALMER, Perkins Coie Brown & Bain P.A., of Phoenix, Arizona. On the brief for defendant-appellee Palm, Inc., was MICHAEL M. MARKMAN, Covington & Burling LLP, of San Francisco, California. Of counsel was ROBERT J. WILLIAMS.

Before RADER, *Chief Judge*, NEWMAN, and PROST, *Circuit Judges*.

NEWMAN, *Circuit Judge*.

Typhoon Touch Technologies, Inc. (“Typhoon”) appeals the decision of the United States District Court for the Eastern District of Texas, holding the patents in suit invalid and not infringed based on the district court’s construction

of the claims.¹ At issue are Typhoon's United States Patents No. 5,379,057 ("the '057 patent") and No. 5,675,362 ("the '362 patent"). The defendants are Dell, Inc.; Lenovo (U.S.), Inc.; Sand Dune Ventures, Inc.; Toshiba American Information Systems, Inc.; Fujitsu America, Inc.; Panasonic Corp. of North America; Apple, Inc. (dismissed); HTC America, Inc.; and Palm, Inc., as manufacturers and/or sellers of laptop and tablet computers and handheld devices such as telephones with additional capabilities.

The district court's rulings concerning the claim terms "memory for storing," "processor for executing," "operating in conjunction," and "keyboardless" are affirmed, and on these rulings the judgment of noninfringement is affirmed. We reverse the ruling that the claim term "means for cross-referencing" is indefinite, and reverse the summary judgment of invalidity on the ground of claim indefiniteness.

DISCUSSION

The '057 and '362 patents are titled "Portable Computer with Touch Screen and Computer System Employing Same," and are of related content. We refer primarily to the specification and claims of the '057 patent, as did the district court. The "Abstract" in the '057 patent describes the general subject matter of both patents, as relevant to this appeal:

A portable, self-contained, general-purpose, keyboardless computer utilizes a touch screen display for data entry purposes. An application generator allows the user to develop data entry applications by combining the features of sequential libraries,

¹ *Typhoon Touch Technologies, Inc. v. Dell, Inc.*, No.6:07-cv-00546-LED, 2009 U.S. Dist. LEXIS 64013 (E.D. Tex. July 23, 2009).

consequential libraries, help libraries, syntax libraries, and pictogram libraries into an integrated data entry application. A run time utility allows the processor to execute the data entry application.

'057 patent, col. 2 II.58-66.

The patents recite the deficiencies of portable devices that require a keyboard for entry of data, and describe the advantages of a portable system using a touch screen. Claim 12 of the '057 patent was designated as representative (with emphasis added to the terms at issue on this appeal):

12. A portable, *keyboardless*, computer comprising:

an input/output device for displaying inquiries on a touch-sensitive screen, said screen configured for entry of responses to said inquiries;

a memory for storing at least one data collection application configured to determine contents and formats of said inquiries displayed on said screen;

a processor coupled to said memory and said input/output device for executing said data collection application; and

an application generator for generating said data collection application and for creating different functional libraries relating to said contents and said formats displayed on said screen, said application generator further comprising *means for cross-referencing responses to said inquiries with possible responses from one of said libraries*; and

a run-time utility *operating in conjunction with said processor* to execute said application and said libraries to facilitate data collection operations.

The terms “memory for storing” and “processor for executing” are included in all of the claims of the ’057 and ’362 patents, and the term “operating in conjunction with” is in all of the claims of the ’057 patent and claims 1-11 of the ’362 patent.

The district court construed the claim as requiring that a device, to be covered by the claim, actually performs, or is configured or programmed to perform, each of the functions stated in the claim. Typhoon states that this requirement is met if the device has the capability of being configured or programmed to perform the stated function, although not so structured in the device provided by a defendant. This aspect is the basis of the judgment of noninfringement.

“Memory for storing”

The district court construed the claim clause “a memory for storing at least one data collection application configured to determine contents and formats of said inquiries displayed on said screen” as:

A memory that must perform the recited function (*i.e.*, storing a plurality of data collection applications, an operating system and data/ at least one data collection application/ data collection application and various libraries/ functional libraries/ a data collection application and an operating system).

Typhoon argues that the district court incorrectly included a “use” limitation in an apparatus claim, by requiring that the memory storing function “must” be performed. Typhoon

directs attention to the statement in the specification that the invention is “an improved, portable, general purpose computer which permits facilitated data entry,” ’057 patent, col. 2 ll. 16-22, and that it suffices if the memory function is “permitted.” Thus Typhoon states that it suffices if the memory is capable of being configured to store data collection applications, even if the memory is not so configured. Typhoon emphasizes that the claims are not method claims, and that it is irrelevant if the function is actually performed by the device, if the device can be programmed or configured to perform the function, citing *Microprocessor Enhancement Corp. v. Texas Instruments, Inc.*, 520 F.3d 1367 (Fed. Cir. 2008).

In *Microprocessor*, this court recognized that apparatus claims may appropriately use functional language. However, the court did not deal with the situation in which an apparatus does not perform the function stated in the claim unless the apparatus is specifically so programmed or configured. The court explained that the apparatus as provided must be “capable” of performing the recited function, not that it might later be modified to perform that function. *See id.* at 1375 (“[the claim] is clearly limited to a pipelined processor possessing the recited structure and capable of performing the recited functions”) (emphasis omitted). Similarly in *Fantasy Sports Props., Inc. v. Sportsline.com, Inc.*, 287 F.3d 1108, 1117-18 (Fed. Cir. 2002), the court rejected “the proposition, as argued by Fantasy, that infringement may be based upon a finding that an accused product is merely capable of being modified in a manner that infringes the claims of a patent.” *See also Telemac Cellular Corp. v. Topp Telecom, Inc.*, 247 F.3d 1316, 1330 (Fed. Cir. 2001) (“[T]hat a device is capable of being modified to operate in an infringing manner is not sufficient, by itself, to support a finding of infringement.”); *High Tech Med. Instrumentation, Inc. v. New Image Indus., Inc.*, 49

F.3d 1551, 1555-56 (Fed. Cir. 1995) (the fact that the accused device could be altered in a way that satisfies the claim term did not lead to infringement).

The district court, in reviewing the specification, held that the “memory for storing” clause requires that the memory is actually programmed or configured to store the data collection application. *See* ’057 patent, col. 2 ll. 64-65 (“[T]he memory of the portable computer stores a data collection application.”); col. 3 ll. 4-6 (“The CPU of the portable computer executes the application and processes the manually entered data pursuant to the application.”). As discussed in *Phillips v. AWH Corp.*, 415 F.3d 1303 (Fed. Cir. 2005) (en banc), the specification is the primary source for determining what was invented and what is covered by the claims, elucidated if needed by the prosecution history.

No error of law or fact has been shown in the district court’s construction of the “memory for storing” term as requiring that the memory function is present in the device in that the device is structured to store at least one data collection application.

“Processor for executing”

The district court held that the “processor for executing said data collection application” requires that “the recited function must be performed (namely, executing the application and the libraries to facilitate data collection operations).” Op. at 13, 2009 U.S. Dist. LEXIS 64013, at *31. Typhoon argues that the “processor for executing” term requires only that the device has the capability of being programmed or configured to execute the data collection application, and that infringement will lie even if it is not so programmed or configured. Typhoon stresses that its invention is a portable device with flexible capabilities, not a

device with a pre-programmed or pre-loaded data collection application.

The district court observed, and we agree, that Typhoon’s position is inconsistent with the patent prosecution record where, in response to the examiner’s rejection on prior art, the applicant narrowed the claims to executing data collection applications that work with functional libraries. The ’057 specification states that “data collection is facilitated by using displayed help fields for each question or subject, sequential and consequential libraries, and cross referencing of entered responses.” ’057 patent, col. 3 ll. 15-18. The patentee is bound by representations made and actions that were taken in order to obtain the patent. *See Phillips*, 415 F.3d at 1317 (“The purpose of consulting the prosecution history in construing a claim is to ‘exclude any interpretation that was disclaimed during prosecution.’” (*quoting Chimie v. PPG Indus., Inc.*, 402 F.3d 1371, 1384 (Fed. Cir. 2005))).

The district court’s construction of the “processor for executing” term is in accord with the patentee’s statements in the specification and during prosecution of the patent application, and is confirmed.

“Operating in Conjunction”

For the claim clause “operating in conjunction with said processor to execute said application and said libraries to facilitate data collection operations,” the district court held that no “construction” was necessary because the meaning was clear. Typhoon argues that the court erred, for the court deemed it to be clear that the run-time utility/ executor/ application generator must be configured and programmed to operate in conjunction with the processor operating system, whereas Typhoon states that the clause is

not so limited. Typhoon again argues that the district court improperly injected a “use” requirement into the claim, and that it suffices if the computer-implemented structures can be configured to operate in conjunction with each other, whether or not they have been so configured in the device charged with infringement.

The specification describes the invention as “an improved portable computer . . . which is specifically adapted for facilitated data collection and recordation.” ’057 patent, col. 2 ll. 44-47. The district court’s holding that the claims require actual adaptation, by program or configuration, conforms with the inventors’ description of what they invented. We discern no error in the district court’s view that this term requires that the device is programmed or configured to perform the stated function.

“Keyboardless”

The term “keyboardless” appears in all of the claims in suit. The district court construed the term to mean “without a mechanically integrated keyboard.” Typhoon argues that this construction is more restrictive than the description in the specification, and that “keyboardless” means that the device does not require the use of a separate keyboard, but that the claims do not exclude devices in which a separate keyboard is present; that is, devices having an integrated mechanical keyboard that need not be used because of the touch screen. Typhoon points to the statement in the specification that the device “requires reduced use of a keyboard for entry of information and data,” ’057 patent, col. 2 ll. 27-28, and the statement that an external keyboard and other peripherals may be “hooked up,” col. 2 ll. 59-61. Typhoon states that the district court’s definition is more restrictive than the definition in the specification.

Typhoon argues that the specification shows that the patentee ascribed a special meaning to “keyboardless,” whereby the ordinary meaning “without a keyboard” does not apply. Indeed, it is established that a claim term “will not receive its ordinary meaning if the patentee acted as his own lexicographer and clearly set forth a definition of the disputed term in either the specification or the prosecution history.” *CCS Fitness, Inc. v. Brunswick Corp.*, 288 F.3d 1359, 1366 (Fed. Cir. 2002). Typhoon states that the clear statement in the specification that mechanical keyboards are not excluded, means that “keyboardless” does not exclude a device having an integrated mechanical keyboard as long as the device can operate without using the mechanical keyboard. Typhoon argues that the specification says and requires no more than that the device does not “require” a mechanical keyboard, not that such a keyboard must be absent.

The district court reviewed the specification, to determine the subject matter that the inventor described as the invention. *See Renishaw PLC v. Marposs Societa’ per Azioni*, 158 F.3d 1243, 1250 (Fed. Cir. 1998) (“Ultimately, the interpretation to be given a term can only be determined and confirmed with a full understanding of what the inventors actually invented and intended to envelop with the claim.”). The district court observed that the specification criticizes mechanical keyboards as “viewed by many would-be users as being laborious or tedious or requiring a skill they have not mastered.” ’057 patent, col. 1 II. 59-67. The specification states that the patented device may include a “simulated keyboard,” ’057 patent, col. 2 II. 62, such as “a keyboard that is produced on-screen,” col. 20 II. 9-10, and discusses the convenience of on-screen operation for a portable device. The specification explains that the user may “key in the answer on the touch-screen, and then the keyboard disappears until needed again.” Col. 20 II. 11-13.

The district court observed that the patents describe no device having a mechanically integrated keyboard, and instead state that an external keyboard may be “hooked up.”

The court construed the claims accordingly, to exclude a mechanically integrated keyboard although not excluding a hooked up peripheral keyboard. The patent specification distinguishes between integrated and peripheral keyboards, and between mechanical and simulated keyboards. We agree with the district court that “keyboardless” means without an integrated mechanical keyboard, but accepts a touch-screen keyboard or a hooked up peripheral keyboard. It is clear from the specification that the inventor so intended, and that the patent examiner so perceived the claims. *See Abbott Labs. v. Syntron Bioresearch, Inc.*, 334 F.3d 1343, 1354 (Fed. Cir. 2003) (the definition or usage of a term that diverges from its ordinary or common meaning must be done “with reasonable clarity, deliberateness, and precision”).

Typhoon criticizes the district court for construing the claims in order to target the accused devices and demonstrate their non-infringement. It is not inappropriate for a court to consider the accused devices when construing claim terms, for the purpose of “claim construction” is to resolve issues of infringement. *See Pall Corp. v. Hemasure Inc.*, 181 F.3d 1305, 1308 (Fed. Cir. 1999) (“Although the construction of the claim is independent of the device charged with infringement, it is convenient for the court to concentrate on those aspects of the claim whose relation to the accused device is in dispute.”); *Scripps Clinic & Research Found. v. Genentech, Inc.*, 927 F.2d 1565, 1580 (Fed. Cir. 1991) (“In ‘claim construction’ the words of the claims are construed independent of the accused product Of course the particular accused product (or process) is kept in mind, for it is efficient to focus on the construction of only the disputed elements or limitations of the claims.”)

The court's construction of "keyboardless" is confirmed.

Stipulation of non-infringement

Typhoon stipulated that on the district court's construction of the three terms discussed *ante*, Typhoon could not prevail on its charges of infringement as to any defendant. *Stipulation for Entry of Final Judgment Based on the Court's Claim Construction*, DKT # 456 (August 31, 2009). We have sustained the construction of these terms, and affirm the judgment of non-infringement.

"Means for cross-referencing"

The district court held that claims 11-12 of the '057 patent are invalid, on the ground that the claim term "means for cross-referencing said responses with one of said libraries of said possible responses" is "indefinite." Claim 8 of the '362 patent was invalidated on the same ground. Section 112 ¶ 2 requires that the claims shall "particularly point[] out and distinctly claim[] the subject matter which the applicant regards as his invention." Compliance with this provision is determined as a matter of law, and receives plenary review on appeal. *Bancorp Servs., LLC v. Hartford Life Ins. Co.*, 359 F.3d 1367, 1372 (Fed. Cir. 2004).

The "means for cross-referencing" term is in the statutory form authorized by §112 ¶ 6, whose purpose is to allow claiming of an element of an apparatus or a step of a method in terms of the function performed by that element or step. The statute provides that a claim may state the function of the element or step, and the "means" covers the "structure, material, or acts" set forth in the specification and equivalents thereof. In turn, the specification must contain sufficient descriptive text by which a person of skill in the field of the invention would "know and understand what struc-

ture corresponds to the means limitation.” *Finisar Corp. v. DirecTV Grp., Inc.*, 523 F.3d 1323, 1340 (Fed. Cir. 2008); *see Biomedino LLC v. Waters Techs. Corp.*, 490 F.3d 946, 952 (Fed. Cir. 2007) (“[W]hile it is true that the patentee need not disclose details of structures well known in the art, the specification must nonetheless disclose some structure.” (*quoting Default Proof Credit Card Sys. v. Home Depot U.S.A., Inc.*, 412 F.3d 1291, 1302 (Fed. Cir. 2005))).

Recognizing that patent claims are terse statements based on the description in the specification, in *S3 Inc. v. Nvidia Corp.*, 259 F.3d 1364 (Fed. Cir. 2001), the court reiterated that:

The requirement that the claims “particularly point[] out and distinctly claim[]” the invention is met when a person experienced in the field of the invention would understand the scope of the subject matter that is patented when the claim is read in conjunction with the rest of the specification. “If the claims when read in light of the specification reasonably apprise those skilled in the art of the scope of the invention, §112 demands no more.”

Id. at 1367 (*quoting Miles Labs., Inc. v. Shandon*, 997 F.2d 870, 875 (Fed. Cir. 1993)). Applying these principles, in *Atmel Corp. v. Info. Storage Devices*, 198 F.3d 1374 (Fed. Cir. 1999), the court explained the role of the specification in functional claiming under §112 ¶ 6:

All one needs to do in order to obtain the benefit of that claiming device is to recite some structure corresponding to the means in the specification, as the statute states, so that one can readily ascertain what the claim means and comply with the particularity requirement of ¶ 2. The requirement of spe-

cific structure in §112, ¶ 6 thus does not raise the specter of an unending disclosure of what everyone in the field knows that such a requirement in §112, ¶ 1 would entail.

Id. at 1382. The courts have applied these principles to the claiming of computer-implemented functions, as illustrated in *Finisar*, *supra*, and other cases. See, e.g., *Source Search Tech. LLC v. Lendingtree LLC*, 588 F.3d 1063, 1076 (Fed. Cir. 2009); *Datamize LLC v. Plumtree Software, Inc.*, 413 F.3d 1342, 1347 (Fed. Cir. 2005).

The district court held that, as applied to the “means for cross-referencing” function, the specification does not contain an “algorithm” adequate to provide structure for this function. The court cited *Aristocrat Technologies Australia PTY Ltd. v. International Game Technology*, 521 F.3d 1328, 1334 (Fed Cir. 2008), for its holding that a means-plus-function term is impermissibly indefinite under §112 ¶ 2 when the specification “simply describes the function to be performed, not the algorithm by which it is performed.” On this ground, the court held that the claim was fatally indefinite. Typhoon argues that the specification contains adequate algorithmic criteria, in conformity with precedent, to perform the computer-implemented function. We agree that precedent supports Typhoon’s position.

The usage “algorithm” in computer systems has broad meaning, for it encompasses “in essence a series of instructions for the computer to follow,” *In re Waldbaum*, 457 F.2d 997, 998 (CCPA 1972), whether in mathematical formula, or a word description of the procedure to be implemented by a suitably programmed computer. The definition in Webster’s New Collegiate Dictionary (1976) is quoted in *In re Freeman*, 573 F.2d 1237, 1245 (CCPA 1978): “a step-by-step procedure for solving a problem or accomplishing some end.”

In *Freeman* the court referred to “the term ‘algorithm’ as a term of art in its broad sense, i.e., to identify a step-by-step procedure for accomplishing a given result.” The court observed that “[t]he preferred definition of ‘algorithm’ in the computer art is: ‘A fixed step-by-step procedure for accomplishing a given result; usually a simplified procedure for solving a complex problem, also a full statement of a finite number of steps.’ C. Sippl & C. Sippl, Computer Dictionary and Handbook (1972).” *Id.* at 1246.

Precedent and practice permit a patentee to express that procedural algorithm “in any understandable terms including as a mathematical formula, in prose, or as a flow chart, or in any other manner that provides sufficient structure.” *Finisar*, 523 F.3d at 1340. In *Finisar* the court explained that the patent need only disclose sufficient structure for a person of skill in the field to provide an operative software program for the specified function. *Id.* “The amount of detail required to be included in claims depends on the particular invention and the prior art.” *Shatterproof Glass Corp. v. Libbey-Owens Ford Co.*, 758 F.2d 613, 624 (Fed. Cir. 1985). In turn, the amount of detail that must be included in the specification depends on the subject matter that is described and its role in the invention as a whole, in view of the existing knowledge in the field of the invention.

Typhoon states that the ‘057 and ‘362 patent specifications recite a four-step algorithm for computer-implemented cross-referencing, starting with the entry of a response, then a search for the entered response in a library of responses, then determination whether a match exists in the library, and then execution of an action if a match exists. Typhoon states that this descriptive algorithm of the cross-referencing function starts with the introduction of the overall invention:

Cross-referencing entails the matching of entered responses with a library of possible responses, and, if a match is encountered, displaying the fact of the match, otherwise alerting the user, or displaying information stored in memory fields associated with that library entry.

'057 patent, col. 3 ll. 43-48. In addition, in a section of the specification headed "Cross Referencing," the description is elaborated:

Cross-Referencing imports that, for each answer field, the entered response can be related to a library to determine if the response in the answer field is existent in the library. In other words, the answer information is cross-referenced against that specific library. If it is available in that library, then, corresponding to that library entry, an action is executed. For instance, the associated action can involve an overlay window that alerts the user of the fact of the match with the library entry, or displays the contents of an information field stored in association with that entry in the memory.

'057 patent, col. 14 l. 57 to col. 15 l. 4. Typhoon states that this description contains sufficient algorithmic structure for the routine programmatic procedures needed to provide cross-referencing responses to inquiries. *See Atmel*, 198 F.3d at 1380 ("[O]ne must set forth in the specification an adequate disclosure showing what is meant by the claim language." (quoting *In re Donaldson*, 16 F.3d 1189, 1195 (Fed. Cir. 1994))). The defendants have directed us to no evidence that a programmer of ordinary skill in the field would not understand how to implement this function.

For computer-implemented procedures, the computer code is not required to be included in the patent specification. *See Aristocrat Techs.*, 521 F.3d at 1338 (the patentee is not “required to produce a listing of source code or a highly detailed description of the algorithm to be used to achieve the claimed functions in order to satisfy 35 U.S.C. §112 ¶ 6”). A description of the function in words may “disclose, at least to the satisfaction of one of ordinary skill in the art, enough of an algorithm to provide the necessary structure under §112, ¶ 6.” *Finisar*, 523 F.3d at 1340.

We agree with Typhoon that the term “means for cross-referencing” is supported by the “structure, materials, or acts” in the specification. The specification states that “the memory of the portable computer stores a data collection application and has locations for storing data entered manually by touching the touch sensitive screen,” ’057 patent, col. 2 ll. 64-66, and that “[t]he CPU of the portable computer executes the application and processes the manually entered data pursuant to the application,” ’057 patent, col. 3 ll. 4-6. The patent recites that “[c]ross-referencing entails the matching of entered responses with a library of possible responses, and, if a match is encountered, displaying the fact of the match, otherwise alerting the user, or displaying information stored in memory fields associated with that library entry.” ’057 patent, col. 3 ll. 43-48. It is not disputed that the steps are carried out by known computer-implement operations, and are readily implemented by persons of skill in computer programming. It appears that the district court placed dispositive weight on Typhoon’s statement that “the specific algorithm connoting the structure of the means for cross-referencing element is not explicitly disclosed in the specification,” for the court refers to this “concession” in its opinion. Indeed, the mathematical algorithm of the programmer is not included in the specification. However, as precedent establishes, it suffices if the

specification recites in prose the algorithm to be implemented by the programmer.

The specifications state that cross-referencing entails the steps of data entry, then storage of data in memory, then the search in a library of responses, then the determination if a match exists, and then reporting action if a match is found. The district court's ruling that the term "means for cross referencing" is indefinite and invalidates the claims in which it appears is not in accordance with law. The judgment of invalidity on this ground is reversed.

Each party shall bear its costs.

AFFIRMED-IN-PART, REVERSED-IN-PART