United States District Court,
C.D. California.

INTERNATIONAL ELECTRONIC TECHNOLOGY CORP,
Plaintiff.
v.
HUGHES AIRCRAFT CO., DirecTV, Inc., and Thomson Consumer Electronics, Inc,
Defendants.

No. CV 97-2678 MRP

Sept. 21, 2005.

Patrick F. Bright, Nordman Cormany Hair and Compton, Oxnard, CA, for Plaintiff.

Daniel A. Devito, David C. Radulescu, Steven D. Glazer, Steven J. Rizzi, Weil Gotshal & Manges, New York, NY, Victor G. Savikas, Jones Day, Los Angeles, CA, for Defendants.

MEMORANDUM OF DECISION and ORDER Re: Claim Construction

MARIANA R. PFAELZER, District Judge.

This is a patent infringement action wherein Plaintiff International Electronic Technology Corp. ("IET") alleges that Defendants Hughes Aircraft Co., DirecTV, Inc., and Thomson Consumer Electronics, Inc. (collectively "Hughes") infringe IET's U.S. Patent No. 4,494,114 ("'114 patent"), which was issued January 15, 1985. The parties have identified six claim terms that require this Court's construction.

INTRODUCTION

I. PROCEDURAL HISTORY

This case was filed on April 14, 1997 and was transferred to this Court on February 17, 2004. FN1 At a March 29, 2004 status conference, the parties agreed to narrow the claim terms to be construed to those that were potentially dispositive of this case. On April 12, 2004 the parties jointly identified six claim terms requiring construction. Joint Identification of Patent Claim Terms for Present Consideration by the Court (filed April 12, 2004) ("Joint Terms"). FN2

FN1. This case was originally assigned to Judge Irving Hill. On October 17, 1997, Judge Hill stayed discovery pending his consideration of the parties' submissions on claim construction. The case was then transferred to Judge Harry L. Hupp on March 31, 1998. Judge Hupp held a claim construction hearing in September of 1998, and took the matter under submission. Neither Judge Hill nor Judge Hupp issued an order construing the patent claims.

On May 3, 2004, IET filed its infringement contentions and proposed interpretation of the disputed terms. Plaintiff's Infringement Contention and Proposed Interpretation of the Six Stipulated Claim Elements of Claim 19 of Plaintiff's U.S. Patent No. 4,494,114 (fried May 3, 2004) ("IET Cont"). Hughes filed its proposed interpretations on the same day. Defendants' Noninfringment Contentions (filed under seal May 3, 2004) ("Hughes' Cont"). The Court postponed ruling on claim construction at the parties' request, pending the en banc decision in Edward H. Phillips v. AWH Corporation, et al., 415 F.3d 1303 (Fed.Cir.2005). The Court held a hearing on August 9, 2005, permitting the parties to discuss the impact, if any, the *Phillips* decision had on their May 2004 filings. On August 15, 2005, Plaintiff filed supplemental infringement contentions and proposed construction of the disputed terms. Plaintiff's Supplemental Infringement Contention and Proposed Interpretation of the Six Stipulated Claim Elements of Claim 19 of Plaintiff's U.S. Patent No. 4,494,114 (filed August 15, 2004) ("IET Supp. Cont"). On the same day Defendants submitted a brief concerning the impact of the *Phillips* decision on this case. Defendants' Brief Concerning the Federal Circuits En Banc Decision in *Phillips v. AWH Corp* (filed August 15, 2004).

The parties' May 2004 filings rely heavily upon briefs previously filed before Judge Hill in 1997 and Judge Hupp in 1998.FN3 The Court has reviewed these documents, and has read transcripts of oral argument on claim construction made before Judge Hupp on September 4, 15 and 18 of 1998. The Court determined that additional oral argument on claim construction was unnecessary.

II. PATENTFN4

The '114 patent describes a security system that renders electronic equipment inoperative following the occurrence of a "disabling event" and then operative again after the entry of a code. '114 patent 3 :51-5, 4 :10-13; *see also* Reexamination Certificate B1 4,494,114 ("Reexam") (issued October 15, 1996).FN5

patented invention, in part because the prior art did not show the disabling step in claim 19. IET Interp: Exh. E, 153-277 ("Reexam History"), p. 256 (Reasons for Patentability/Confirmation).

Of the 31 claims of the '114 patent only two, independent claim 19 and dependent claim 20, are at issue in this case. Claim 19 is a method claim:

A method of rendering electronic equipment having a *normal operation* inoperative after a *disabling event* has occurred, and for maintaining the equipment inoperative after the *disabling event* has occurred, comprising the steps of:

(a) programming a microprocessor having an *internal, non-volatile, protected memory* for executing a program stored in the *internal memory,* said program having *an operational routine for controlling the normal operation of the equipment,* and a *security routine for controlling the security of the equipment;*

(b) accessing the *internal memory* of the microprocessor solely by the microprocessor, and protecting the internal memory from interrogation external to the microprocessor;

(c) distinguishing between an initial execution of the *security routine* and a subsequent execution of the *security routine;*

(d) storing in response to the initial execution of the *security routine* a first code in a secured manner in the *internal memory* of the microprocessor such that the stored fist code is protected from interrogation external to the microprocessor;

(e) *entering a second code to the microprocessor;*

(f) comparing the *entered second code* to the stored first code whose identity is protected from external interrogation;

(g) enabling the microprocessor in response to a completed initial execution, or to the subsequent execution, of the *security routine,* to execute the operational routine after the first code has been stored in the *internal memory* of the microprocessor, and *maintaining the equipment normally operational until the disabling event has occurred;*

(h) detecting when the *disabling event* has occurred;

(i) disabling the equipment from *normal operation* after the *disabling event* has occurred, and

(j) maintaining the equipment disabled, even after the *disabling event* has terminated, until the *entered second code* matches the stored first code.

'114 patent 15 :59-16 :32 (emphasis added to highlight disputed terms). Claim 20 depends from claim 19 and describes the method of claim 19 when more than one microprocessor is utilized. '114 patent 16 :32-38.

LEGAL STANDARDS

Claim interpretation or construction is exclusively a question of law. *Markman v. West view Instr.*, Inc., 52 F.3d 967 (Fed.Cir.1995). To interpret patent claims courts look primarily to intrinsic evidence, including the patent specification and prosecution history, and secondarily to extrinsic evidence. Id. at 979.

I. INTRINSIC EVIDENCE

"It is a bedrock principle of patent law that the claims of a patent define the invention to which the patentee is entitled the right to exclude." Phillips, 415 F.3d 1303, at 1312 (internal quotation marks omitted). Accordingly, a court, in construing the terms of a patent, should look first to the language of the claim itself. Vitronics Corp. v. Conceptronic, Inc., 90 F.3d 1576, 1582 (Fed.Cir.1996).

The words of a claim "are generally given their ordinary and customary meaning." Phillips, 415 F.3d 1303, at 1312 (internal quotation marks omitted). "The ordinary and customary meaning of a claim term is the meaning that the term would have to a person of ordinary skill in the art in question at the time of the invention, i.e., as of the effective filing date of the patent application." *Id*.

The ordinary meaning of a term cannot, however, be construed in a vacuum; rather, a court must "must look at the ordinary meaning in the context of the written description and the prosecution history." Medrad, Inc. v. MRI Devices Corp., 401 F.3d 1313, 1319 (Fed.Cir.2005). The court does so to "determine whether the inventor used any terms in a manner inconsistent with their ordinary meaning." Vitronics, 90 F.3d at 1582.

Recently, the Federal Circuit clarified the importance of using the specification and other intrinsic evidence to determine the meaning of a claim. "[T]he specification is the single best guide to the meaning of a disputed term, and it acts as a dictionary when it expressly defines terms used in the claims or when it defines terms by implication." *See* Phillips, 415 F.3d at 1321 (internal quotation marks omitted). Similarly, a patent's prosecution history may clarify the meaning of a claim, particularly in light of exchanges between the patent applicant and the Patent and Trademark Office. *See* Northern Telecom, Ltd. v. Samsung Elecs. Co., 215 F.3d 1281 (Fed.Cir.2000). Thus, the claim language, the specification, and the patent prosecution history, collectively referred to in patent law as the "intrinsic record," are the foundation of claim construction analysis. Vitronics, 90 F.3d at 1582-83 ("Such intrinsic evidence is the most significant source of the legally operative meaning of disputed claim language.")

II. EXTRINSIC EVIDENCE

Extrinsic evidence consists of all evidence external to the patent and prosecution history, and includes expert and inventor testimony, dictionaries and learned treatises." *Markman*, 52. F.3d at 1583. After *Phillips,* courts may still use extrinsic evidence "to better understand the underlying technology" and the way in which one skilled in the art might use the claim terms. Phillips, 415 F.3d at 1318 (citing Vitronics, 90 F.3d at 1584 *n*.6). However, the *Phillips* court acknowledged that extrinsic evidence is less significant and reliable than the intrinsic record in determining the legally operative meaning of claim language. *Id*. at 1317. Therefore, when construing claim terms, extrinsic evidence should be used only when necessary, and then, only when considered with the intrinsic evidence. *Id*. at 1319.

DISCUSSION

For the reasons outlined below, the Court adopts IET's proposed constructions of "disabling event" and "internal, non-volatile protected memory", a modified form of Hughes' proposed construction of "security

routine for controlling the security of the equipment", and Hughes' proposed constructions of "entering a second code to the microprocessor/entered second code", "maintaining the equipment normally operational until the disabling event has occurred", and "an operational routine for controlling the normal operation of the equipment/normal operation."

I. DISABLING EVENT

A. Construction

A "disabling event" is "any occurrence or happening, that would, in accordance with the particular embodiment of the invention, cause the microprocessor to cause the electronic equipment, to become inoperative or incapable of normal operation." This is IET's proposed construction.FN6 Joint Sub:2.

FN6. The Defendants propose a much narrower construction: "a physical phenomenon indicative of a removal or theft of electronic equipment." Hughes' Cont:1.

B. Analysis

IET's proposed construction most closely captures the manner in which "disabling event" should be understood given the plain meaning of the phrase and the disclosure in the specification. According to the plain and ordinary meaning of the terms, a "disabling event" is an occurrence that makes something incapable or ineffective. Webster's Ninth New Collegiate Dictionary (1984) ("Webster's") defines the terms "disable" and "event" as they were understood at the time the patent was being prosecuted. Webster's defines "disable" as "to make incapable or ineffective" and "event" as "something that happens." FN7 Because the security routine makes the electronic equipment inoperative, an event that triggers the microprocessor's switch from its normal operating routine to its security routine is a disabling event.

FN7. Where the ordinary meaning of claim language as understood by a person skilled in the art is readily apparent, as it is here, general purpose dictionaries may be helpful in conveying the widely accepted meaning of commonly understood words. Phillips, 415 F.3d at 1314.

The Court's construction is supported by the patent's specification. The invention claimed in the '114 patent is a method of using a programmed microprocessor to secure electronic equipment. *See* '114 patent 3 :59-64, 15 :59-16 :31. The microprocessor is programmed to have two routines: an operational routine and a security routine. '114 patent 15 :64-16 :2. The importance of the disabling event is that when the detector means identifies the presence of the disabling event it triggers a switch from the microprocessor's operational routine to its security routine. '114 patent 4 :56-64. It is unimportant to the claimed invention what the disabling event is; it is only important that it cause the microprocessor to switch from the operational to the security routine.

Hughes argues that a disabling event must be indicative of removal or theft. It is clear that discouraging theft of electronic equipment is the problem that the inventor of the '114 technology sought to solve. *See* '114 patent 3 :1-4 (describing as one of the objectives of the invention "to secure microprocessor-controlled electronic equipment against theft by rendering the stolen equipment essentially valueless to the thief"). However, because the patent claims "disabling event" generally, instead of "theft event" specifically, this Court will not utilize the specification to narrow the scope of the claim terms.

The specification clearly describes the disabling events mentioned in the patent-a change in position or disconnection from a source of electricity-as examples. '114 patent 3 :56-58. It is of no consequence to the described method what the disabling event is; it is only important that it be detectable by some means such that the microprocessor switches from its operational to its security routine when the disabling event occurs. *See* '114 patent 4 :56-64. Thus, any event that causes the microprocessor to adopt its security routine is a "disabling event", as that term is used in the '114 patent.

II. INTERNAL, NON-VOLATILE, PROTECTED MEMORY

A. Constructions

"Protected memory" is construed to mean "protected from external non-destructive interrogation, both physical and electronic ." FN8 This is the construction IET proposed. Joint Sub: 6.FN9

FN8. The first step of the claimed method includes "programming a microprocessor having an internal, non-volatile, protected memory for executing a program stored in the internal memory." '114 patent 15 :64-66. The parties have stipulated to constructions of "internal" and "non-volatile". Only the phrase "protected memory" remains in dispute. Joint Stipulation Re: Interpretation of the Patent Claims at Issue in U.S. Patent No. 4,494,114 ("Joint Stip"): 2 :7-9, 11-12.

FN9. The Defendants' proposal is very similar, except that it eliminates the phrase "external non-destructive," instead defining this phrase to mean "memory that is protected from interrogation, both physical and electronic." Hughes' Cont:2.

B. Analysis

The parties' briefs indicate that their dispute is about whether the memory must be protected from both destructive and non-destructive interrogation, or only from non-destructive interrogation.FN10

FN10. The limitation that the memory be protected from "external" interrogation, which is the other difference between the parties' proposed constructions, does not appear to be in dispute.

Reference to the language of the claims alone does not offer guidance as to whether memory must be protected from all interrogation or only from non-destructive interrogation in order to be deemed "protected memory." The claim language only requires that the memory be protected, and does not further specify what it must be protected from. Because the proper construction of the term "protected memory" is not obvious from the plain meaning of the claim terms, the Court must turn to alternate sources of intrinsic evidence.

The article "the" precedes the phrase "protected memory" each time it is used in the '114 patent specification, suggesting reference back to a prior description of "protected memory". This description is found in the brief description of the invention:

The microprocessor has an internal non-volatile memory, e.g. a read/write random access memory (RAM) with a batter back-up circuit, or an electrically erasable programmable read only memory (EEPROM)

accessed solely from within and protected from external interrogation, both physical and electronic.

'114 patent 3 :64-4 :2. Hughes' proposed definition comes almost directly from this language in the patent; the "non-destructive" limitation is not included in the patent's description of the types of interrogation from which the memory is protected.

Hughes' position is further supported by the patent's discussion of prior art. The background section of the '114 patent lists drawbacks of the prior art that the invention seeks to overcome. Among these is the Nakamichi radio, which has security features that, according to the '114 specification, can be compromised by being opened, interrogated, and then reproduced. '114 patent 2 :19-29. When the '114 patent states that "it is a general object of the present invention to overcome the aforementioned drawbacks in the prior art" those drawbacks presumably included the destructive interrogation of the memory that was possible with the Nakamichi radio. *See* '114 patent 2 :66-68.

Nevertheless, removing the "non-destructive" qualifier from the construction of "protected memory", as Hughes proposes, would exclude virtually any physical embodiment, including the preferred embodiment described in the patent. When other reasonable interpretations exist, a Court may not construe patent terms to so limit the breadth of the claims such that even the preferred embodiment would not fall within the patent's scope. Vitronics Corp. v. Conceptronic, Inc., 90 F.3d 1576, 1583 (Fed.Cir.1996); Hoechst Celanese Corp. v. BP Chems, Ltd., 78 F.3d 1575, 1581 (Fed.Cir.1996) ("We share the district court's view that it is unlikely that an inventor would define the invention in a way that excluded the preferred embodiment, or that a person of skill in this field would read the specification in such a way."). Because it excludes the preferred embodiment described in the patent, it is highly unlikely that Hughes' proposed construction encapsulates the inventors' intent in using the phrase "protected memory". The Court therefore rejects Hughes' proposition that the memory must be protected from destructive as well as non-destructive interrogation.

Even with a construction that requires that the memory be protected only from non-destructive interrogation, the invention described in the '114 patent does not succumb to the shortcomings of the Nakamichi reference. The security codes in the Nakamichi radios were identical; thus, a thief could employ destructive interrogation of one radio to learn a code that would enable the thief to compromise the security of many other similar radios. This is not the case for the present invention, because each piece of equipment protected by the method described in the '114 patent can have a unique code. *See* '114 patent 3 :18-21, 29-31. Thus destructive interrogation of a piece of equipment protected by the security arrangement described in the '114 patent would simply destroy the equipment, and would not provide information that could compromise the security of similar equipment. Although protection from destructive interrogation would be important for a piece of equipment utilizing the security arrangement in the Nakamichi radio, it is not important to the security arrangement described in the '114 patent because there would be no reason to attempt destructive interrogation, given the features of the claimed invention. Thus the invention overcomes the shortcomings of the Nakamichi radio even if the memory is not protected from destructive interrogation.

To be "protected", the memory need only be protected from interrogations that would compromise the security of the equipment. Consequently, it must be protected from physical and electronic non destructive interrogation, but not necessarily from destructive interrogation.

III. SECURITY ROUTINE FOR CONTROLLING THE SECURITY OF THE EQUIPMENT

A. Construction

A "security routine for controlling the security of the equipment" is construed to mean: "a program stored in the internal memory of the microprocessor that, when executed, renders stolen electronic equipment essentially valueless to the thief." This is similar to the construction proposed by Hughes, but removes the requirement of "physical" theft.FN11

FN11. IET suggests that the "security routine is the procedure stored in the internal memory that controls the security of the equipment by restricting access to data in files and/or permitting only authorized use of electronic equipment with which the security routine is to be used." Joint Sub:7. Hughes' proposed definition is: "a discrete segment of a computer program for controlling the protection of the equipment against physical removal or theft." Hughes' Cont:2. The Court's construction adopts Hughes' understanding that "security" is used to indicate protection from theft, but does not accept the limitation that the theft must be *physical* theft.

B. Analysis

The word "security" occurs twice in this disputed term. The parties appear to agree, and it is clear from the claims, that a "security routine" is a program stored in the internal memory of a microprocessor that, upon its initial execution, causes the microprocessor to store a first code in a secured manner and then, upon subsequent executions, causes the electronic equipment to become disabled and to remain disabled until a second code is entered that matches the stored first code. *See* '114 patent 15 :68-16 :32.

The parties' debate centers around the second use of the word security, which specifies a purpose for the security routine: "controlling the security of the equipment." The meaning of this expression of the purpose of the security routine is not obvious from the plain language of the claims, but the specification makes the meaning of this phrase clear.

The '114 specification describes the purpose of the security routine as rendering stolen equipment valueless to a thief. Among the objectives of the patented invention is "to secure microprocessor-controlled electronic equipment against theft by rendering the stolen equipment essentially valueless to the thief." '114 patent 3 :1-4. In the description of the invention, the patent notes that:

The stolen equipment, in accordance with this invention, is essentially valueless to the thief because the equipment will remain inoperative unless the private code is entered to the microprocessor.

'114 patent 5 :22-25. These references to preventing theft are the only explanation in the '114 patent as to what is meant by the phrase "for controlling the security of the equipment." It is thus apparent that the inventor intended to and did claim a security routine for rendering stolen electronic equipment essentially valueless to the thief.

Hughes insists that the "theft" being referenced must be "physical removal or theft." Hughes' Cont: 2. Neither this Court nor, apparently, Hughes have been able to find support in the specification or file history for limiting the purpose of the security system to physical theft. Although the preferred embodiment of the invention teaches a security routine used to render electronic equipment valueless when its position is moved or power source disconnected-indications of physical theft-the claims cannot be limited to the preferred embodiment. Thus in deciding that the security routine must, according to the '114 specification,

render stolen electronic equipment essentially valueless to the thief, this Court does not find that the thief must necessarily have committed physical theft.

The patentee chose to claim not just a security routine, but a security routine for a particular purpose. This Court will not ignore that limitation. The Court consequently adopts a modified form of Hughes proposed definition, which incorporates the stated purpose of the security routine into the construction of this term.

IV. ENTERING A SECOND CODE TO THE MICROPROCESSOR/ENTERED SECOND CODE

A. Construction

This Court's construction of "entering a second code to the microprocessor/ entered second code" is "a user of electronic equipment physically entering the code to the microprocessor." This is the construction that Hughes proposed. FN12 Hughes' Cont:2.

FN12. IET's proposed construction was "after the first code is stored in the microprocessor, a second code (another code) is entered into the microprocessor." J.Sub:12.

B. Analysis

The passive language of step (e) of claim 19-"entering a second code to the microprocessor" does not provide guidance regarding the center of the parties' dispute: who must enter the code, and how must it be entered. The '114 specification and prosecution history clarify that the user must enter the second code via a keypad; this supports the Court's construction of the phrase at issue.

1. *Who Must Enter the Code*

There is significant support in the specification and prosecution history for the Defendant's proposition that the code must be entered by the user. A number of stated objectives reference "a user" selecting, changing, and entering the code.FN13 The description of the invention also indicates that the code is known only to the user, suggesting that it must be the user who enters the code. *See* '114 patent 5 :7-9("In accordance with an advantageous aspect of this invention, the private code is unique for each microprocessor, [and] is known only by the user ..."); *id*. at 5:25-27(explaining that the invention protects against theft by stating: "Inasmuch as the private code is just that, i.e. secret and selected by and known only to the user, there is no way for the thief to obtain the code."). Finally, during the prosecution of the ' 114 patent the patentee stated:

FN13. Among the stated objectives are: "to allow a user to easily change the private access code to another", "to avoid the necessity of compelling a user to enter a private access code prior to each and every usage of the equipment", "to provide a user with a wide choice of codes of which the user may select any one which ensures ease of memorization", and "to provide a custom-made security invention, whose private access code is known only to the user." '114 patent 3 :14-25, 29-32, 42-44.

One of the main features of this invention is that the security arrangement renders electronic equipment inoperative after a disabling event has occurred, and maintains the equipment inoperative even after the disabling event has terminated unless and until a *user enters a code* which matches a previously stored code.

'114 Prosecution History, IET.Interp: Exhibit D, 122 (emphasis added). It is thus apparent that the patentee contemplated that the code would be known and used only by the user.

2. *How the Code Must be Entered*

The parties also debate how the code must be entered. Hughes argues that "entering" a code must be different from "storing" a code, as is required by step (d), with the difference being that while the first code may be written into the memory, the second must be physically entered by the user.

The ordinary meanings of the terms "store" and "enter" suggest that the distinction between them is that while the first code is furnished to the microprocessor and held for future use, the second code is not necessarily held beyond the time it is initial input. *See* Webster's, p. 415 (defining the relevant verb form of "enter" as "to put in: insert (~the new data into the computer)"); *id*. at 1162 (defining "store" as "furnish, supply; *esp:* to stock against a future time").

In this patent, however, it is less clear that the distinction between "storing" and "entering" is solely about the amount of time the information is held. The claim language specifies that the first code is stored in the internal memory of the microprocessor. '114 patent 16 :10-14. The second code only must be entered "to the microprocessor." '114 patent 16 :15. This difference suggests that the second code, unlike the first, is not input directly into the internal memory of the microprocessor. The claim language does not clarify this difference, so the Court must look outside the language of the claims to decide how the means by which the first code is stored differs from the procedure by which the second code is entered.

The specification clarifies that a keyboard is used to enter the second code. The description of the invention includes this explanation:

The microprocessor is programmed to compare *a code entered by the keyboard* during the subsequent program execution, as determined by the distinguishing means, to the stored private code whose identity is protected from external interrogation.

'114 patent 4 :65-5 :1 (emphasis added). The phrase "the keyboard" must refer back to prior examples of "a manual entry keyboard" as a method for storing or changing the first code. '114 patent 4 :34-35; 4 :50-55. The manual entry keyboard is only an example of how the first code could be entered, but it appears to be the exclusive means of entering the second code. '114 patent 4 :65-5 :1.

V. MAINTAINING THE EQUIPMENT NORMALLY OPERATIONAL UNTIL THE DISABLING EVENT HAS OCCURRED

A. Construction

"Maintaining the equipment normally operational until the disabling event has occurred" is construed to mean "until a 'disabling event' occurs, the microprocessor executes only its operational routine and not its security routine." This is the construction Hughes proposed. Hughes' Cont:2.FN14

FN14. IET's proposal was that this phrase means "maintain the equipment normally operational, i.e., to continue executing its operational routine, until the disabling event has occurred." Joint Sub:13.

B. Analysis

The parties' debate centers around whether the operational and security routines are mutually exclusive, or whether both could be running simultaneously. IET argues that even when the security routine has disabled "normal operation", some aspects of the operational routine could still function. Joint Sub:13. IET suggests that equipment could have more than one operational routine, such that when the security routine is executed one routine is disabled while others continue to function. Joint Sub:13.FN15 However, the plain language of claim 19 describes a single operational routine and a single security routine that are executed in a mutually exclusive manner.

FN15. IET notes that the commercial version of the described example functions in this manner. Joint Sub:13.

The claimed method includes only one operational routine and one security routine. Step (a) of the claimed method describes programming a microprocessor with *an* operational routine and *a* security routine. '114 patent 15 :67-68. Step (g) requires the microprocessor "to execute the operational routine." The use of singular articles in the claim language demonstrates that only one operational routine and one security routine are contemplated by the patent.

It is clear from the language of the claims that the' operational routine and the security routine are mutually exclusive. The purpose of the operational routine, according to step (a) of claim 18, is "controlling the normal operation of the equipment." '114 patent 15 :67-68. Step (g) also makes it clear that when the operational routine is executed the equipment is maintained normally operational until a disabling event is detected. '114 patent 16 :19-25. Then, according to steps (i) and (j), the equipment is disabled from normal operation and maintained disabled until the proper code is entered. ' 114 patent 16: 27-30. The operational routine maintains normal operation of the equipment, and the security routine disables normal operation. As equipment cannot be simultaneously operating normally and not normally, the operational and security routines cannot be running simultaneously.

This construction is supported by the '114 specification. The description of the invention discusses the operational routine, which maintains equipment normally operational until a disabling event is detected, whereupon the security routine is executed "in order to disable the equipment from normal operation." '114 patent 4 :41-46, 56-64. As is true in the claims, the specification describes a microprocessor that executes either the operational routine or the security routines, but not both at the same time. The language of the specification leaves no room for simultaneous normal (operational) and not normal (security) operation.

VI. AN OPERATIONAL ROUTINE FOR CONTROLLING THE NORMAL OPERATION OF THE EQUIPMENT / NORMAL OPERATION

A. Construction

This term is construed to mean "the procedure or set of program codes that controls the normal operation of the equipment." This is the construction proposed by Defendant Hughes. Hughes' Cont:2.FN16

FN16. Actually, this construction was initially proposed by IET. *See* IET Reply, 23. In later papers, however, IET changed its proposal to "a procedure or set of program codes that controls at least the essential elements of the normal operation of the equipment." J.Sub.17.

B. Analysis

There is simply no support in the claim language, the specification, or the file history for IET's suggestion that the operational routine controls only the "essential elements" of the normal operation.

The claim language is clear that the operational routine controls the normal operation of the equipment. Step (a) of claim 19 involves programming a microprocessor with "an operational routine for controlling the normal operation of the equipment." '114 patent 15 :67-68. The operational routine is executed, thus "maintaining the equipment normally operational" until the occurrence of a disabling event. '114 patent, claim 19, step (g), 16:19-25. Once a disabling event has been detected, the claimed method involves "disabling the equipment from normal operation". The claim language contains no limitation on "normal operation" or "normally operational". There is no language to suggest that anything less than all of the normal operation of the equipment is controlled by the operational routine.

The specification and file history support this construction. The description of the invention in the specification describes "an operational routine for controlling the normal operation of the equipment" without placing limits on what aspects of the normal operation must be controlled by the operational routine. Similarly, in his statement accompanying a petition for accelerated examination the patentee describes the operational routine as maintaining the equipment normally operational. IET Interp., Exh. D ("Prosecution History"), p. 84. Subsequently, in the remarks to a proposed amendment, the patentee again describes the microprocessor as controlling the "normal operation" of equipment, without limiting the control to "essential elements" of normal operation. Prosecution History, p. 122. A similar description of the invention was given during the reexamination proceedings. Reexam History, p. 159-60.

Throughout the prosecution history and in both the specification and claims, the patentee described the operational routine as controlling the normal operation of the equipment. At no time prior to this claim construction process was it suggested that only parts of the normal operation needed to be controlled by the operational routine. The context of the patent and the language of the claims identify the "normal operation", without further qualification, as what must be controlled by the operational routine; this Court will not add additional unsupported limitations.

CONCLUSION

The Court adopts the following constructions:

- *disabling event:* any occurrence or happening, that would, in accordance with the particular embodiment of the invention, cause the microprocessor to cause the electronic equipment, to become inoperative or incapable of normal operation.

- *internal, non-volatile, protected memory:* protected from external non-destructive interrogation, both physical and electronic.

- *security routine for controlling the security of the equipment:* a program stored in the internal memory of the microprocessor that, when executed, renders stolen electronic equipment essentially valueless to the thief.

- *entering a second code to the microprocessor/ entered second code:* a user of electronic equipment

physically entering the code to the microprocessor.

- maintaining the equipment normally operational until the disabling event has occurred: until a 'disabling event' occurs, the microprocessor executes only its operational routine and not its security routine.

- an operational routine for controllincf the normal operation of the equipment / normal operation: the procedure or set of program codes that controls the normal operation of the equipment.

IT IS SO ORDERED

C.D.Cal.,2005.
International Elec. Technology Corp. v. Hughes Aircraft Co.

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