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The Doctrine of Equivalents Lives

In a long-awaited decision by the United States Supreme Court on the scope of the "doctrine of equivalents" under the patent laws, and despite the expectation by many that the Supreme Court would severely limit the scope of the doctrine, the Supreme Court in *Warner-Jenkinson Co. v. Hilton-Davis Chemical Co.* has largely left the doctrine intact. As before, a company's product or process can infringe another company's patent, even if it is not the same as the patent claims, as long as it is "equivalent." The application of the doctrine remains a question of fact, to be decided by a jury, and the scope of the doctrine is not limited to what is described or shown in the patent. Although the Supreme Court did provide for an alleged infringer some stronger defenses to the doctrine where a patent holder narrowed the patent claims during prosecution, the doctrine remains a powerful tool for a patent holder.

Warner-Jenkinson (frequently identified as the Hilton-Davis case, because Hilton-Davis was the name of the plaintiff) involved a patent for an ultrafiltration process. The key limitation during the litigation was a requirement of the patent claims that the process operate at a pH level "from approximately 6.0 to 9.0," which was added during prosecution of the patent application. This limitation had been added to the patent to distinguish a prior patent that disclosed a process operating at a pH above 9.0. It was unclear why the patent holder added

the low-end limit of 6.0. The defendant (Warner-Jenkinson) used a process with a pH of 5.0 and both the trial court and the Federal Circuit ruled that this process, although different from the patented process, infringed the patent under the doctrine of equivalents. Before the Supreme Court, the defendant (and several industry associations) argued that the doctrine of equivalents should be severely limited, if not eliminated. However, the Supreme Court rejected most of these arguments. The Court stated that arguments directed toward the elimination or restriction of the doctrine of equivalents should be addressed to Congress.

The Court ruled that equivalence should be evaluated at the time of infringement. "Equivalents" need neither be disclosed in the patent nor known at the time the patent issues for them to infringe the patent.

The Court also ruled that application of the doctrine of equivalents does not depend on the "equities," such as whether the defendant copied the patented product. Instead, the determination of infringement under the doctrine of equivalents is an objective test. The intent of the defendant to infringe, copy, or not is irrelevant.

Although the Court declined to narrow the types of cases in which the doctrine could apply, it was receptive to arguments that the doctrine of equivalents should not be applied too broadly. A broad application of the doctrine would conflict with the requirement that the invention set forth in the patent claims be definite and give the public notice of what infringes and what does not.

As a general principle, the doctrine of equivalents does not enlarge the scope of the patent claim, according to the Supreme Court. It merely permits the substitution of equivalent elements to what are stated in the claim. The doctrine must be applied to each of the individual elements of the claim (not the claimed invention as a whole) -- that is, the infringing device or process must have an equivalent to each element of the claim. Moreover, the

doctrine cannot be applied so as to "entirely vitiate" a claim element. That is, an equivalent cannot effectively read a requirement out of the claim altogether.

The Court also addressed the doctrine of "prosecution history estoppel," which under some circumstances will limit the doctrine of equivalents. As refined by the Court, prosecution history estoppel prevents the application of the doctrine of equivalents to a particular claim element that was added to the claim during prosecution to distinguish the patented invention from the prior art. In order to be able to apply the doctrine of equivalents to a claim element, the patent holder must establish that the claim change was not related to avoiding the prior art. Turning to the facts of the case before it, the Court reversed and remanded the case to the Court of Appeals to determine whether Hilton-Davis could establish a reason for adding the lower pH limit of 6.0 to its patent that was unrelated to the prior art and which would not preclude application of the doctrine of equivalents.

Although the Court set forth some guidelines for determining when the doctrine of equivalents does not apply (such as when an equivalent would eliminate a claim element or an element was amended in response to some prior art), the Court provided little new guidance for determining when an accused product or process has an equivalent element. The Court endorsed as one test whether the element in the accused product is known in the art (at the time of the infringement) to be interchangeable with the element in the claim. The Court also agreed that, at least with mechanical devices (but not necessarily for other products or processes), a suitable test is whether the element in the accused product performs substantially the same function, in substantially the same way, to obtain substantially the same result as the element in the patent claim. In some situations, independent experimentation by the defendant will be accepted as evidence that the defendant's different element was not a known substitute for the claimed element.

The Court recognized that an "insubstantial differences" test (which the Federal Circuit had

used) provides little guidance for determining when the differences are insubstantial. However, the Court left open the use of different (and unspecified) tests to assess whether the accused product and the claim contain equivalent elements, provided that a finding of equivalence does not eliminate a claim element. It was expressly left to the Federal Circuit to provide a more concrete formulation for when an element is equivalent.

At least for now, the Court also left the determination of equivalents to the jury. However, to permit easier review of the jury's decision, the Court suggested that, rather than just determining infringement, the jury be asked to make a specific determination as to each claim element.

For a company seeking to obtain patent protection, *Warner-Jenkinson* must be considered with care. Any claim element that is added or narrowed during prosecution of the patent application will be presumed to create an estoppel to applying the doctrine of equivalents. In some cases, it may be possible to avoid the need to amend the claims by presenting a wide range of claims or by anticipating possible prior art rejections with a thorough patent search. However, in many cases, it will be difficult to avoid amending the claims following a search by the Patent Office. Where an amendment is made for reasons other than to avoid the prior art (such as to claim aspects of the invention that were not previously claimed), a clear explanation for the amendment should be provided to reduce the risks of an estoppel.

In litigation, how equivalence will be determined remains difficult to predict. A patent holder will try to argue that a different element in an accused product is known to be interchangeable with the claimed element and therefore that the different element is equivalent. The company accused of infringement will try to argue that application of the doctrine of equivalents to its device either eliminates an element of the claim or broadens that element, contrary to the Court's suggestions that the doctrine must not enlarge the scope of a claim beyond what was allowed by the Patent Office. The accused company also will argue that any amendment to a

claim creates an estoppel that bars application of the doctrine.

The Supreme Court assumed that a focus on whether there is an equivalent to each element, mindful of the principle that an equivalent cannot eliminate an element, should provide some certainty. However, it will take further decisions by the Federal Circuit to know how the doctrine will apply in practice.

New Weapon Against Theft Of Trade Secrets

Under the Economic Espionage Act of 1996, trade secret misappropriation now constitutes a federal crime. The legislation represents a marked change in the area of trade secret law. Previously, trade secret protection fell almost exclusively under state civil law. Even for states that had passed criminal laws condemning trade secret misappropriation, sufficient funds typically were not allocated to investigate and enforce these laws. Federal prosecutors, prior to this new legislation, would sometimes bring charges under federal racketeering (RICO) provisions, but these charges generally could be brought only if the activity involved fraudulent use of mail or wire services in interstate commerce. Because of these restrictions, federal laws could not always provide prosecutors with the tools they needed to bring charges for theft of trade secrets.

The new statute is very broad in terms of both the types of punishable activities and the locations of the acts that can be subject to prosecution. The Economic Espionage Act punishes stealing, copying, or receiving a trade secret knowingly and without authorization. It also makes attempts and conspiracies with other persons to commit such offenses a felony.

The Act extends broadly to acts taking place outside the United States. Thefts occurring outside the U.S. come within the law if the thief is a United States citizen or corporation, or if

any act in furtherance of the misappropriation of the trade secret occurs inside the United States.

The Act defines trade secrets as "financial, business, scientific, technical, economic, or engineering information." This information is protectible if the owner has made reasonable efforts to keep it secret and if the information provides an economic advantage to the owner as a result of it being generally unknown or readily undiscoverable via a proper means by the public.

The penalties for Economic Espionage Act offenses are severe. Individuals can be fined up to \$500,000 and receive jail sentences of up to ten years. Businesses risk fines of up to \$5 million. If a foreign government or agent is involved, then the penalties increase to a possible fifteen-year jail term and \$10 million in fines. The Act also provides that the government may bring forfeiture proceedings to seize the proceeds of the theft and property used in the commission of the crime.

Businesses should be aware of the implications of this far-reaching statute. As a potential trade secret owner, the importance of maintaining trade secret status is increased, as the consequences of stealing trade secrets are now significantly more severe. Employees should be made aware of the need to keep valuable information confidential and to be careful in exchanging valuable information with partners or other companies with which the company does business.

At the same time, businesses should realize that they may be subject to a federal criminal investigation and, perhaps, prosecution, for the actions of their employees. Businesses should limit the risk of exposure by requiring employees, consultants, and affiliates to obey strict written policies against the use of any secret information that was learned, for example, from prior employment or business relationships.

Trends In Patent Claim Interpretation

Last year, the U.S. Supreme Court ruled in *Markman v. Westview Instruments* that the interpretation of terms in a patent claim is to be made by the court rather than the jury. A series of decisions since *Markman* by the U.S. Court of Appeals for the Federal Circuit illustrates how courts should carry out their role of interpreting claim terms.

In *Vitronics Corporation v. Conceptronic, Inc.*, the Federal Circuit addressed the roles of "intrinsic evidence" and "extrinsic evidence" in interpreting the terms in a patent claim. Intrinsic evidence is the patent itself and its "prosecution history" -- the record of the proceedings in the Patent Office that led to the issuance of the patent. Extrinsic evidence is everything else that is used to interpret the terms, such as expert testimony, dictionary definitions, and the use of the terms in other patents and publications.

In *Vitronics*, both parties manufactured ovens used to solder electrical devices. The key issue was the meaning of the claim limitation "solder reflow temperature." In adopting Conceptronic's proposed claim interpretation, the trial court relied not only on the specification, but also on expert testimony and other extrinsic evidence, such as a paper written by a former employee of Vitronics. This evidence showed that those skilled in the art would, in certain circumstances, understand the term "solder reflow temperature" to mean the temperature at which the solder became a liquid. However, the Federal Circuit ruled that the patent used the term to refer to the higher temperature reached by the liquid solder during the soldering process. The Court interpreted the claim accordingly, ignoring the extrinsic evidence. Citing *Markman*, the Court held that a proper analysis should "look first to the intrinsic evidence of record, i.e., the patent itself, including the claims, the specification and, if in evidence, the prosecution history."

If the words of the claims themselves as amplified by the intrinsic evidence are unambiguous, then resort to extrinsic evidence is improper.

In *Ethicon Endo-Surgery, Inc. v. U.S. Surgical Corp.*, the parties disagreed as to the meaning of the phrase "in a staple cartridge" in a patent claim directed to a surgical instrument. The trial court analyzed the embodiment of the invention disclosed in the specification and defined the disputed claim limitation by reference to the only type of "staple cartridge" disclosed in the specification. With this narrow interpretation, the trial court granted summary judgment of noninfringement.

The Federal Circuit, affirming the trial court's ruling, distinguished between reading into the claims limitations found in the disclosed embodiments and using the embodiments as tools to aid in the interpretation of the meaning associated with a given term already in the claim. While acknowledging that limitations in particular embodiments should not be read into the claims, the Court found it perfectly appropriate to use the embodiments as definitional guides for words already in the claims. Hence, deducing the meaning of a disputed phrase in the claim by reference to the use of the phrase in describing the embodiment shown in the patent specification was an appropriate practice.

In *Athletic Alternatives, Inc. v. Prince Manufacturing, Inc.*, the Federal Circuit addressed those instances in which the claim language, the specification and the prosecution history do not supply a clear and unambiguous interpretation of a patent claim limitation.

The parties in that case disagreed as to the proper definition of the phrase "varies between" in a patent claim for a tennis racket. An analysis of the record uncovered two equally plausible and yet contradictory interpretative strands running through the patent's prosecution history. The Court concluded that even the prosecution history was thus unhelpful as an interpretative

resource.

Consequently, the Court focused on the statutory requirement that the specification "conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention." Embracing the same policy considerations upon which *Markman* is predicated, the Court emphasized that the primary purpose of the description requirement is "to guard against unreasonable advantages to the patentee and disadvantages to others arising from uncertainties as to their respective rights."

The Federal Circuit reasoned that in instances where a claim term is ambiguous, adoption of a broad interpretation of the claim would "undermine the fair notice function of the requirement that the patentee distinctly claim the subject matter disclosed in the patent from which he can exclude others temporarily." Thus, the Court enunciated a rule providing that in situations in which the meaning of a claim is truly ambiguous, the "notice function" is better served by adopting the narrower meaning. Taken together, *Markman* and the subsequent cases may have a profound impact on the manner in which patents are prosecuted and litigated. For example, these cases indicate that patent prosecution requires even more care than ever. The specification and statements made during prosecution have primary importance under *Vitronics*.

The importance of the examples, under *Ethicon*, and the desire to avoid ambiguities, under *Athletic Alternatives*, suggests that the patent should include a number of examples and definitions. However, a large number of examples or express definitions could lead a court to limit the scope of the claims to the particular embodiments described in the patent.

During litigation, *Markman* and *Vitronics* could have a great impact on the use of expert testimony. The importance of intrinsic evidence and the impropriety of extrinsic evidence in the absence of ambiguities suggests that expert testimony will play a smaller role than in the

past. However, the decisions leave open the ability to use expert testimony to provide "background information" about the technology. In cases where the claims use obviously technical terms, as is particularly common in biotechnology patents, a court may need and welcome expert testimony.

Similarly, *Vitronics* may downplay the testimonial aspects of "Markman hearings" -- the increasingly common hearings at which the trial court interprets the patent claims, as a prelude to motions for summary judgment and to trial. Following *Vitronics*, courts may often determine that live testimony is unnecessary or even inappropriate at these hearings. This, in turn, may make trial courts more willing to hold *Markman* hearings before trial, knowing that *Markman* hearings will be much shorter than a trial and recognizing that, in many cases, once the claims are interpreted, few if any facts will remain in dispute for trial.

Active Negotiations Between a Patent Holder and Its Potential Licensee Can Limit Declaratory Judgment Actions

When a patent owner sends a threatening letter indicating that another company is infringing a patent and should take a license, the other company may respond by bringing a "declaratory judgment" lawsuit, which asks the Court to declare that the patent is invalid, not infringed by the other company, or both. Patent owners that are merely seeking license revenue and do not wish, at least in the first instance, to commence litigation must walk a fine line in order to get and keep a prospective licensee's attention without ending up in court facing a declaratory judgment action. However, recent decisions by the Court of Appeals for the Federal Circuit suggest that patent owners face a reduced risk of declaratory judgment actions once they engage in negotiations with potential licensees.

For a party to bring a declaratory judgment action, the patent owner's conduct must have

created a "reasonable apprehension" that the patent owner will initiate an infringement action if the party continues its allegedly infringing activity. Unless such a "reasonable apprehension" is present, a trial court is required to dismiss a declaratory judgment action. For example, mere discussions about a license without an assertion of infringement or statement that the patent owner intends to sue, or general statements that the patent owner takes its proprietary rights seriously, may not be sufficient to create a reasonable apprehension of being sued.

Even when such a "reasonable apprehension" is present, a trial court has discretion to dismiss a declaratory judgment action if it does not believe that maintaining such an action is appropriate.

In *EMC Corp. v. Norand Corp.*, the trial court dismissed a declaratory judgment action because the parties were engaged in ongoing licensing negotiations when the action was filed. The court reasoned that the potential licensee could have used the pending declaratory judgment action to improve its bargaining position in the ongoing negotiations, and that such a use would constitute an abuse of the Declaratory Judgment Act. The Federal Circuit upheld the dismissal on appeal.

The Federal Circuit held that the potential licensee had a "reasonable apprehension" of suit and that the trial court was therefore empowered to hear the declaratory judgment action. However, because the parties were engaged in ongoing licensing negotiations, the dismissal was proper.

As a general rule, the Court stated that absent an "abuse of discretion" by the trial court, the appeals court would uphold the trial court's decision.

The Federal Circuit made it clear that ongoing negotiations would not always make dismissal of a declaratory judgment action appropriate. For example, the patent owner should not be

permitted to feign interest in negotiations in order to avoid a declaratory judgment action while letting the potential damages grow. However, ongoing good-faith negotiations will often make the need for judicial relief less compelling than when there is no real prospect of a non-judicial resolution of the matter. Under these circumstances, according to the Court, the patent holder legitimately may be attempting to avoid litigation and a declaratory judgment action would be inconsistent with the courts' policies of promoting extra-judicial dispute resolution and conserving judicial resources. Consequently, dismissal of a declaratory judgment action would be appropriate, although not required.

The Federal Circuit also noted that by cutting off negotiations, the accused company reduces the prospect of a non-judicial resolution of the matter. This makes it appropriate for the court to hear a declaratory judgment action, assuming the accused company has a reasonable apprehension of being sued.

Thus, for a patent holder, the likelihood of being brought unwillingly into a lawsuit by a possible licensee can be reduced by engaging in negotiations and avoiding direct threats to bring a lawsuit. Unfortunately for the potential licensee, negotiations do not prevent the patent holder from bringing an infringement action at any time. To level the playing field, the potential licensee could insist that, if negotiations are to take place, the patent holder agree not to bring suit for a certain period of time. Alternatively, if facing actual threats, the potential licensee can terminate negotiations and file a declaratory judgment action.

Federal Law Protection Against Use of Another's Famous Trademark

Prior to 1996, Federal law did not provide a remedy for trademark "dilution" -- often described as an unauthorized use of another's trademark which causes or contributes to a gradual

whittling away of the identity of a mark. Imagine, for example, Microsoft dish cloths, Toyota contact lenses, or NYNEX shoes. Federal trademark infringement remedies might not have protected against such unauthorized uses, because of the need to demonstrate a likelihood of confusion. The protection against trademark dilution was instead frequently a subject of state law.

State law typically also provided some protection against dilution by "tarnishment" -- linking another's trademark to products of shoddy quality, or its portrayal in an unwholesome or unsavory context likely to evoke unflattering thoughts about the trademark owner's product.

In recent years, the protection afforded to a trademark owner against the tarnishing commercial use of its trademark has expanded under some state laws. For example, in 1994, the United States Court of Appeals for the Second Circuit, applying New York law, found that the alteration of the John Deere trademark in competitive advertising -- an animated, miniature version of the leaping deer logo running in apparent fear while being chased around a yard by a competitor's lawn tractor and a barking dog -- constituted a form of "tarnishment" of Deere's trademark prohibited under the New York anti-dilution law.

Because the use of the Deere logo occurred in an advertisement for a competing product, there was no likelihood of confusion; no one was likely to believe that Deere sponsored the ad or was the source of the competing product. Nevertheless, under state law the court noted that using another's trademark in competitive advertising is not permissible where the trademark has been both altered and used in a tarnishing way.

However, not all states provided the same protection in cases of unauthorized, competitive use of another's trademark. Historically, protection against trademark dilution focused on non-competing goods, such as the hypothetical Microsoft dish cloths, Toyota contact lenses or NYNEX shoes mentioned above. Accordingly, many states did not extend protection against

trademark dilution to cases involving competing goods unless the familiar "likelihood of confusion" standard could be met.

In 1996, the Federal Anti-Dilution Statute, 15 U.S.C. § 1125(c)(1), was enacted, providing national protection against the diluting use of any "famous" trademark, whether federally registered or not, regardless of the absence of a likelihood of confusion. The legislative history of the Federal Act makes clear that it is intended to protect against the "tarnishing" use of a trademark as well as other forms of dilution. Further, the Federal Act applies regardless of the presence or absence of competition between the owner of the famous mark and the person alleged to be diluting it.

Accordingly, even in those states which previously did not fully protect against dilution in the competitive context or where state law protection was not clear, the Federal law now provides an explicit remedy, including nationwide injunctive relief. The Federal law, however, applies only to marks which become "famous" prior to the use by the allegedly diluting person. The combination of an expanded scope of protection against dilution through tarnishment, and the new, nationwide availability of Federal remedies for dilution even in cases involving competitors, warrants a careful review of competitive advertising which uses someone else's trademark. Many trademark owners are becoming more aggressive about policing against what they view to be unflattering uses of their trademarks in competitive advertising, and recent developments in state and Federal law add to their arsenal of arguments to prevent such uses.

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